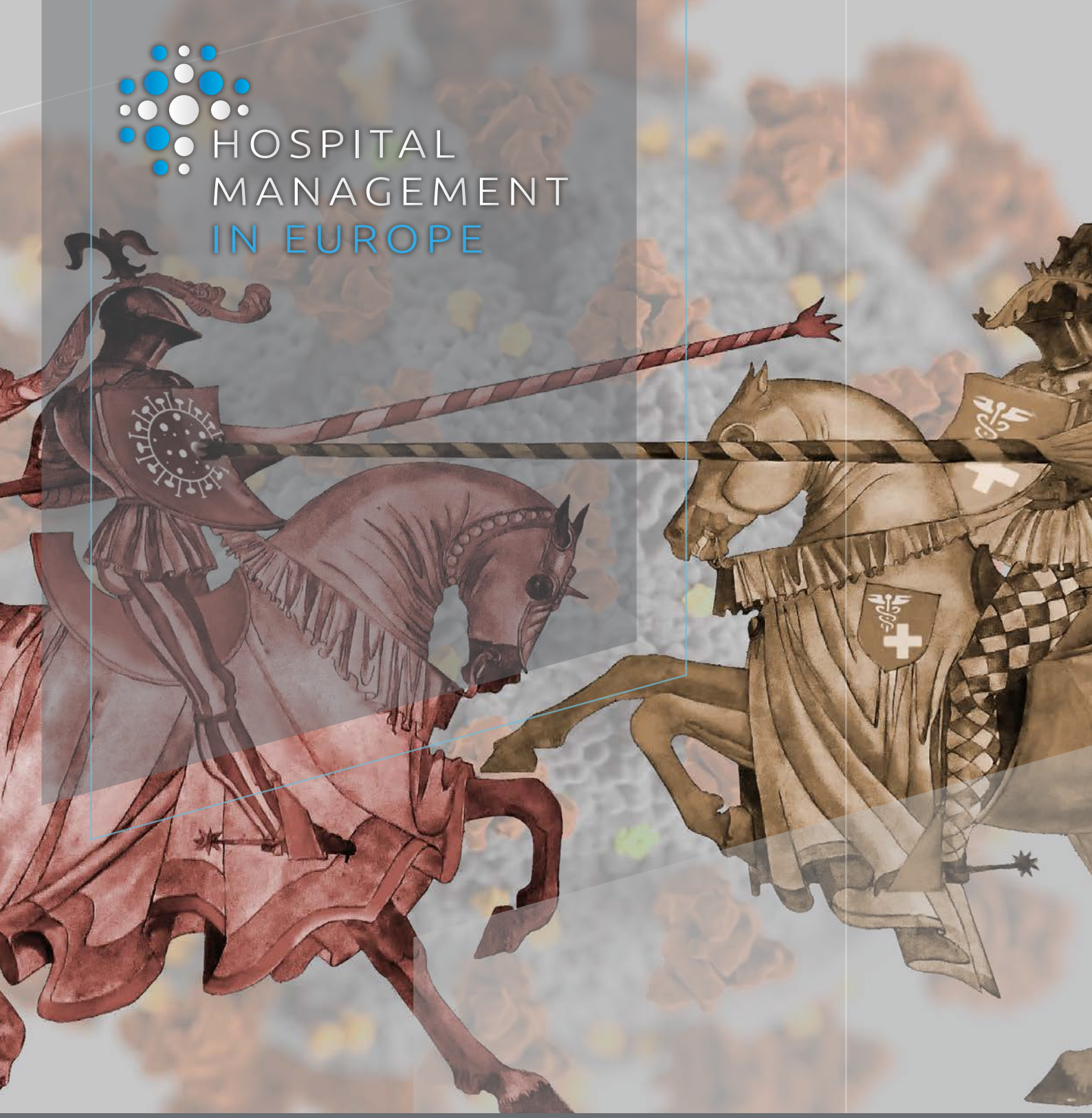
HOSPITAL MANAGEMENT IN EUROPE



Nr 1 - October 2020

FOCUS : COVID-19

Healthmanagement faced with virus

MENTAL HEALTH

Official Journal of the European Association of Hospital Managers

EUROPEAN ASSOCIATION OF HOSPITAL MANAGERS

EUROPEAN ASSOCIATION
OF HOSPITAL MANAGERS

European Association of Hospital Managers - EAHM
Association Européenne des Directeurs d'Hôpitaux - AEDH
Europäische Vereinigung der Krankenhausmanager - EVKM
5, rue des Mérovingiens
Z.A. Bourmicht
L- 8070 BERTRANGE
GRAND-DUCHY OF LUXEMBOURG
Tél. : 00 352 42 41 42-1
Fax : 00 352 42 41 42-81
sg@eahm.eu.org

Editor-In-Chief : Marc Hastert

Advertising Agency :
Publiest, 1, rue Jean Piret
L-2350 Luxembourg
Tel. : 00 352 26 48 02 32

Layout : Julie Iltis
Mail : sg@eahm.eu.org

Printing : Imprimerie Heintz, Pétange (Grand-Duchy of Luxembourg)
Issues : 4 times a year / free Edition : 1,650 copies.

If you would like to publish any information in this publication, contact the Editorial Board at the following address :
sg@eahm.eu.org
www.eahm.eu.org

HOSPITAL
MANAGEMENT
IN EUROPE

Well done!

The big fear of the last thirty years, a worldwide deadly pandemic, finally happened. It is not the avian flu, not the swine flu, not the 2003-SRAS, but COVID-19. The consequences are terrible: 700 000 dead at the end of July and the worst economic crisis since the Second World War.

The pandemic is not over but we can learn some lessons from our experience to date.

Firstly, the fight against infectious diseases is not won, even in Europe and other developed countries, despite medical progress, despite improvement in health education. Perhaps it will never be won. Earlier fears about SARS, avian and swine flu came to pass - we must remain vigilant in the future.

Secondly, the healthcare systems of each country must be ready to fight this kind of epidemic, that can appear anywhere and spread all over the world within a few months. When it happens, healthcare systems which are developed to deal with 'normal' diseases and which are not in a position to manage such large numbers of sick people struggle to provide good care to everyone.

Thirdly, the hospitals have a key role in these types of events. When confronted by COVID-19 hospital workers have been heroic. Not only doctors and nurses who are in the front line but also administrative and technical staff who support the caregivers, - finding the capacity and supplies for large numbers of patients and, of course, managers who had to reorganise their hospitals within a very short space of time. They have done a great job, sometimes without individual protective equipment - too many of them died. I think we can use about them the words of Churchill during the Battle of Britain: «Never was so much owed by so many to so few». Yes, hospital managers and all other hospital workers deserve a great «Well done!».

Fourthly, international cooperation has a key role in the fight against the pandemic. Perhaps the world avoided major pandemics with avian and swine flu, and SARS in 2003 thanks to the rapid actions taken as soon as these viruses appeared. The lack of information about what happened in Wuhan and how dangerous the new virus was meant that precious weeks were lost to other countries in preparing to protect themselves against COVID-19. In an increasingly connected world, where a virus can travel everywhere within a few days, we need more than ever to share information about diseases and the means to overcome them.

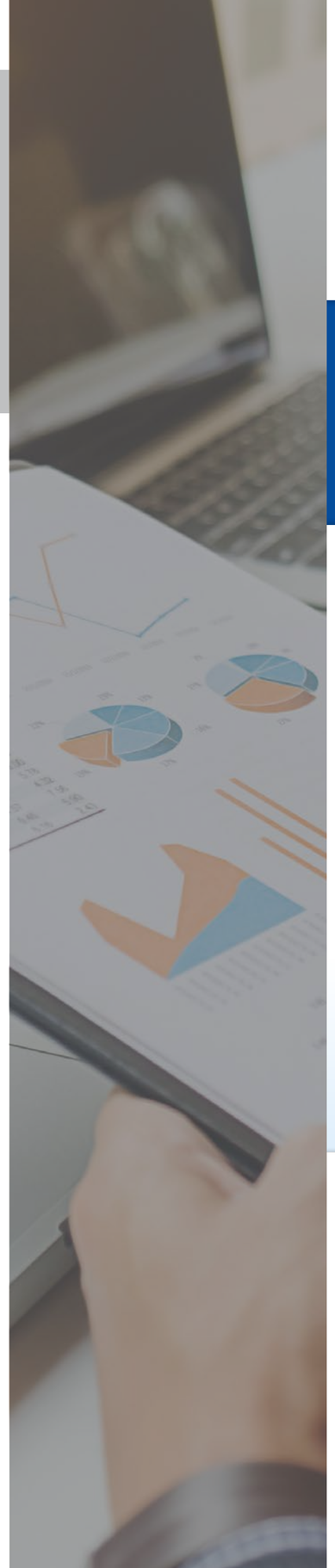
The sharing of experience is one of the main goals of EAHM. Our association was created fifty years ago, in 1970. 2020 is a sad year to celebrate this anniversary. However it is a time which proves the necessity of our work. This journal is a new mechanism for sharing information between hospital managers and with the wider community of many others who are interested in healthcare. I hope you find this first issue useful - it will be followed by many more.

I wish you interesting reading.

Philippe Blua
EAHM President

« The ultimate measure of a man is not where he stands in moments of comfort and convenience, but where he stands at times of challenge and controversy »

Martin Luther King



Interview

European Commission - Directorate General for Health and Food Safety

Responses by DG SANTE to «Hospital Management in Europe»

The European Association of Hospital Managers, concerned about being able to consider the points of view and visions of the main players in Health in Europe, consulted the European Commission - Directorate General for Health and Food Safety, which was kind enough to respond to a number of issues related to the COVID-19 crisis.

The questions asked concern above all the evolution of the situation within the framework of the current health crisis but also more generally the evolution of the field of competence of the institutions of the European Union and the necessary adaptations with regard to the digital revolution and new technologies.

INTERVIEW

In your opinion, should the area of health / social security remain in the area reserved for the Member States? Are we not currently witnessing a transfer of powers to the European Union induced by case law and health crises like Covid-19?

COVID-19 has shown very clearly that a united and coordinated approach in crisis preparedness and response mechanisms in the European Union is crucial to better protect the health of our citizens. Many – including members of the European Parliament and our citizens, as seen in recent polls – are calling for a stronger role for the EU on health.

On the budget front, the Commission has proposed to dedicate increased funds to health via an enhanced programme called EU4Health, sending a clear message that public health is a priority area for our recovery. The outcome of the ongoing discussions with European Parliament and the Council is expected end of 2020.

The Conference on the Future of Europe should provide an excellent forum to discuss whether we want 'more Europe' in the area of public health or whether we need to reassess who does what at national and European level with particular regards to threats that affect us all.

European countries are currently facing a serious health crisis. What has the European Union done in this area? Does the European Union have a specific health crisis management policy?

Since January, the European Commission has been coordinating a common European response to the coronavirus outbreak. We are taking resolute action to reinforce our public health sectors and mitigate the socio-economic impact in the European Union. We are mobilising all means at our disposal to help our Member States coordinate their national responses and are providing objective information about the spread of the virus and effective efforts to contain it.

The COVID-19 pandemic is an unprecedented challenge, with far-reaching consequences for citizens, public health and our daily lives. The Commission works closely with EU Member States, together with the European Centre for Disease Prevention and Control (ECDC), providing coordination, guidance and support. Public health matters (the responsibility for the organisation of - and the delivery of - healthcare services), however, are the competence of EU Member States and it is the national governments that decide on the specific measures based on each country's national epidemiological and social situation. The Commission's role is therefore chiefly to ensure coordination but we have also provided direct support to Member States, using instruments and funding available at EU level.

The chief tools for crisis management of cross-border health threats at EU level are the EU Early Warning and Response System and the Health Security Committee, where Member States and the Commission stay in permanent contact to rapidly exchange information and discuss coherent, coordinated approaches to the crisis. The EU has also supported Member States directly through Joint Procurement calls for medical countermeasures, organised by the Commission, for items such as gloves, masks, ventilators, testing kits and lab supplies, and intensive care supplies.

The EU has purchased masks through the EU Emergency Support Instrument (ESI), currently being distributed to Member States. ESI was also used to buy doses of the first treatment to be authorised against COVID-19 in the EU – Veklury (Remdesivir). In addition, the EU has provided direct support under the EU Civil Protection Mechanism, such as to coordinate the delivery of personal protective

material, carry out repatriation flights from outside Europe, and co-finance the delivery of assistance and the transport of medical teams from one country to another. ESI is also used for securing access to future COVID-19 vaccines, under the EU Vaccine Strategy.

What are the health issues where Europe is most active today?

With the arrival of COVID-19, health has come into sharper focus more than ever before. The European Commission is committed to ensure the health and wellbeing of its citizens through the pursuit of actions that aim to ensure healthy lives of its citizens. Currently, a COVID-19 vaccine is a top priority for the Commission – a necessity to protect our citizens.

In June, the European Commission adopted an EU Strategy for COVID-19 vaccines, the aims of which are to ensure quality, safety and efficacy of vaccines, and secure timely, equitable and affordable access for Member States and their population while leading the global solidarity effort. The Commission and Member States have been in intense discussions with vaccine producers, and building on this work the Commission has put forward a proposal for joint action at the EU level.

In autumn the Commission will present its pharmaceutical strategy that will aim to address key issues such as how to improve access to state-of-the-art and affordable therapies as well as to reduce Europe's dependency on third-countries as shown by the COVID-19 crisis.

The pandemic has also brought into sharper focus the importance of a resilient food system and food security. Our Farm to Fork strategy identifies the strong links between our health, ecosystems and supply chains and proposes solutions to make every stage of the food supply more sustainable.

As flagged in Commissioner Kyriakides' mission letter last year, cancer is a clear priority for this Commission's mandate. The figures speak for themselves: 3.5 million people are diagnosed with cancer in the EU every year. The Europe's Beating Cancer Plan, which should be presented this autumn, will aim to tackle every key stage of the disease from prevention, diagnosis and treatment to palliative care, research and innovation.

Through these efforts, the Commission is steadfast is its commitment to fulfilling its mandate in ensuring the health of Europe's citizens.

The digital revolution is transforming hospitals and medical techniques. How can Europe support these developments and innovation in general?

Health services have been, and are, continuously evolving. Leaps in innovation, technology and most of all, knowledge have allowed Europeans to live longer and more fruitful lives. Digitalisation is the latest revolution in health systems and has enormous potential. It can affect the way health services are delivered, the mobility of EU citizens and plays a role in how health data can be used for the benefits of research, citizens, policy makers as well as many areas in the private sector.

The current COVID-19 health crisis only highlights the crucial and ever-increasing role digitalisation will play in our lives in times ahead. The European Commission is committed to ensuring the health of its citizens and digitalisation is the next step in providing this.

For example, in order to tackle COVID-19, the European Commission and the Member States have defined a common approach for efficient contact tracing apps. These apps are voluntarily installed by citizens and are based on Bluetooth proximity technology that does not enable tracking of people's locations. They alert people who have been in proximity to an infected person for a certain duration, so that they can take necessary actions to protect themselves and the people around them, quickly halting transmission. The objective of the European cooperation on the tracing apps facilitated by the Commission is that users should be able to rely on a single app even when they cross borders between the Member States, based on the interoperability between these national apps, and coordination between the countries.

To facilitate greater cross-border healthcare access, the Commission is building an electronic cross-border health service – an infrastructure ensuring the continuity of care for European citizens while they are travelling abroad in the EU. The two electronic cross-border health services that are currently progressively introduced in EU countries are the ePrescription and the digital Patient Summary.

An ePrescription (and eDispensation) allows EU citizens to obtain their medication in a pharmacy located in another EU country, thanks to the online transfer of their electronic prescription from their country of residence where they are affiliated, to their country of travel. A Patient Summary provides information on important health related aspects such as allergies, current medication, previous illness, surgeries. The digital Patient Summary provides doctors with essential information in their own language.

The exchange of ePrescriptions and Patient Summaries is open to all the Member States. By 2022, these services should gradually be implemented in 22 EU countries. In the longer term, the Commission is working towards a European electronic health record exchange format accessible to all EU citizens. ■

The Association of Hospital Manager Physicians of Lithuania

and Its Role in the Lithuanian Healthcare System

The Association of Hospital Manager Physicians of Lithuania (The Association) is a non-profit organization uniting legal entities providing healthcare as well as natural persons working in management or health services. The Association started its activities in 1991. On 31 August 1996 the Association was accepted into the European Association of Hospital Managers (EAHM).

The Association currently has over 140 members (including 2 university hospitals, 9 republican hospitals, 11 regional hospitals, 35 district hospitals, 9 outpatient clinics, 34 primary care centres, psychiatric hospitals, ambulances, sanatoriums, mental health centres, rehabilitation hospitals, nursing hospitals, etc.).

The bodies of the Association are as follows: the General Meeting; the Council; the Audit Commission; the Ethics Commission. The governing bodies of the Association comprises of the Board – a collegial management body, and the President – a sole holder governing body.

The main purpose of the Association is to unite the members of the Association, coordinate their activities, represent and defend the rights and legitimate interests of the members of the Association.

The Association is actively involved in the development and implementation of health policy in Lithuania; participates in drafting and development of legislation regulating the organization, financing, provision of healthcare services and the activities of healthcare institutions; submits proposals for draft legislation to the Government of the Republic of Lithuania and the Ministry of Health; participates in health policy development and implementation structures as well as various working groups; advises state and local self-government authorities, non-governmental organizations on issues related to the Association's activitievs, organization of healthcare and activities of different healthcare institutions; establishes equal partnerships with state, local, governmental and non-governmental organizations involved in shaping and implementation of healthcare policies.

Moreover, the Association in cooperation with Lithuanian Universities (Vilnius University, Mykolas Romeris University in Vilnius, Lithuanian University of Health Sciences in Kaunas) organizes training and conferences for healthcare managers on various topics, such as health policy and strategy innovations; quality management system of healthcare; healthcare financing and health insurance; human resource management; innovations in the organization and administration of healthcare activities, etc.

So the role of the Association is significant the Lithuanian Healthcare System as well as in the management development of physicians. ■

Dr. Kęstutis Štaras
President of the Association of Hospital Managers Physicians of Lithuania

http://www.lgvs.lt/apie/

COVID - 19

Austria report

In mid-March a bundle of measures were taken to prevent as much as possible a shortage of capacities to treat Covid-19 patients. These were in particular a suspension of elective interventions as well as examinations, where medically justifiable and a partial reorientation of wards and staff. The rosters were also adjusted and fixed teams were often formed. With few exceptions, patient visits in hospital were prohibited and access of patients and staff have been regulated. Furthermore, inpatient rehabilitation facilities were partially closed and made available as additional capacities for acute care. In Vienna and Salzburg for example also conference centers have been equipped to administer and treat patients with suspected or confirmed COVID-19 infections. Fortunately, we hardly needed these facilities.

In the outpatient sector, the use of teleservices like e-medication was facilitated and increasingly implemented. Teleconsultations in psychotherapy reimbursed by the social health insurance have been made possible.

In the meantime, surgical interventions both in the in- and the outpatient sector are gradually being resumed. But, what we see is that despite the precautions such as making appointments by telephone, keeping distance, additional hygiene measures such as patients as well as all staff members having to wear masks, people often avoid visiting health care facilities. It is important to regain the trust of patients, in that postponing needed treatment or examinations is no longer necessary, since there would be long-term health consequences.

Strengthening and reinforcing primary health care as a means to ensure an efficient and sustainable health system is still high on the agenda in Austria. However, one lesson learned from the COVID-19 crisis regarding the future planning of the health care sector and its resilience, is that the comparatively large capacity in the Austrian hospital sector - especially concerning intensive care beds - have proven very beneficial during the crisis. Therefore, it needs to be ensured that also in the future appropriate capacities in the health care sector, especially in critical areas, can be provided in extraordinary situations such as pandemics. ■

Nikolaus Koller

COVID-19 Outbreak Disrupting

Hospital Management Silos

As of today's, 7 March 2020, World Health Organization (WHO) statement[1] the global number of confirmed cases of COVID-19 has surpassed 100.000. Governments and healthcare organizations all around the globe are monitoring closely the reports and recommendations from WHO and the Centers for Disease Control and Prevention (CDC),[2] in limiting the number of cases and slowing the spread of the virus. Efforts are focused simultaneously on containing the spread and mitigating the impact of this public health threat, in order to offer health systems, scientists and society time required to prepare and respond.

Widespread transmission of COVID-19 would translate into large numbers of people needing medical care at the same time, as it happened in China and the northern Italy. The severity of coronavirus "poses great strain on critical care resources in hospitals, especially if they are not adequately staffed or resourced"[3] and the European CDC recommends that hospitals set up a core team including hospital management, infection control team member, infectious disease experts, intensive care unit and accident and emergency departments' specialists[4].

The CDC "Hospital Preparedness Assessment Tool" highlights important areas for hospitals to review in preparation for COVID-19 patients care, such as prevention of the spread within the facility, identification and isolation of patients with possible COVID-19 and informing the correct facility staff and public health authorities, monitoring and managing any healthcare personnel that might be exposed to COVID-19, effective communication within the facility and planning for appropriate external communication related to COVID-19, etc.[5] Moreover, WHO "Hospital Readiness Checklist for COVID-19"[6] suggests that if there is no mechanism in place for coordinated hospital incident management, the hospital director should promptly convene a meeting with all heads of service in order to create an ad hoc IMS. An IMS is essential for the effective development and management of the hospital-based systems and procedures required for successful COVID-19 response. Hospital leaders at all levels must step forward to ensure good communication and to bring about this management commitment across the organization.

Cooperation, communication, and collaboration are the three keys to safeguard lives, improve health outcomes, reduce healthcare costs and strengthen hospital preparedness for when outbreaks occur. A silo mentality, at this outbreak era, will reduce the organization's efficiency with significant unwelcome consequences. Organizational silos refer to unit divisions that operate independently and avoid or cannot, due to operational system limitations, share information. Silos, on one hand, may offer a practical way to manage large numbers of people and allocate accountabilities and responsibilities within a hierarchy, but on the other hand, can also create a silo mentality. Silo thinking leads to healthcare workers with a narrow vision, only being focused on their own areas, which may be against other departments' agendas and the overall organizational targets.[7,8]

Overcoming the silo mentality is no easy feat, but it is imperative if hospital leaders and organizations are to survive during a rapidly evolving outbreak. Successful managers should encourage the free flow of essential information between departments so that all aspects of the hospital can function effectively. Lack of communication fuels panic and panic could potentially jeopardize established working routines. Coronavirus outbreak is the "elephant in the room" and, once has been identified, it is important that all executives and all members of management work together towards achieving the common goal. That is to say, manage effectively the organization response.

David Malpass, President of the World Bank Group, reminds us that "During the Sars and Mers outbreaks, we saw how weak … hospital management led to higher morbidity and mortality".[9] That must be changed now. The timing is right to concentrate resources to pursue the opportunity. People often use the phrase "window of opportunity" or "critical window" to describe a time period during which an opportunity must be seized.[10, 11] Health workers play an important role during epidemics and studies, of past 2014 Ebola Virus Disease epidemic challenges faced by health workers, show that they need supportive supervision, peer support networks and better use of communication technology.[12]

Challenges such as communication errors, uncertainty, and risk while addressing public concern can lead to a range of outcomes, including a loss of trust and reputation, economic impacts, and -in the worst case- a loss of lives, both patients and workforce. While there are always new lessons to be learned, there are actions we know will work. This is a call to managers to ensure that removing silos mentality is an essential component of your health emergency readiness and response activities. A common problem of silo mentality is that people see things from their perspective and they are likely to make choices that protect themselves or their department. Coping with coronavirus outbreak sets each person in the organization to work toward a common goal and, when people across the hospital have the same objectives, they are more likely to communicate better. After all, accurate and timely communication is necessary to ensure informed decision-making, effective collaboration and cooperation, awareness and trust amongst the workforce.

Another way to break down silos is to educate, work, train together in cross-departmental exercises and interactions, as Melissa Agnes -a crisis management strategist- stress.[13] A suggestion that falls in with WHO recommendation[6] "providing training at areas of need, including infection prevention and control, clinical management, in order to ensure staff competency and safety". Hospital resilience and preparedness cannot be achieved in isolation of other co-workers, units, and organizations. Management is the key to bringing these elements together and leadership is needed to reduce and mitigate risks. It is doubly

important during a crisis response phase when an ability to motivate staff to meet unexpected challenges arises.[14] COVID-19 motivates cooperation, communication, and collaboration for the preparation for adverse events.

In this crisis we all need to step up to the plate and make a difference. If not now, when? ■

Georgia Oikonomopoulou, PhD(c), MSc in Health Policy and Strategic Planning, Board member of European Association of Hospital Managers (EAHM) and of Hellenic Health Services Management Association (HHSMA).

goikonomopoulou@eemyy.gr

References
1. WHO (2020), Available from: https://www.who.int/news-room/detail/07-03-2020-who-statement-on-cases-of-covid-19-surpassing-100-000
2. CDC (2020), Available from: https://www.cdc.gov/coronavirus/2019-ncov/summary.html
3. Xiaobo Yang, et al (2020). Clinical course and outcomes of critically ill patients with SARS-CoV-2 pneumonia in Wuhan, China: a single-centered, retrospective, observational study. Lancet Respir Med 2020. Published Online February 21, 2020 https://doi.org/10.1016/S2213-2600(20)30079-5
4. European Centre for Disease Prevention and Control (2020). Checklist for hospitals preparing for the reception and care of coronavirus 2019 (COVID-19) patients. Available from: https://www.ecdc.europa.eu/en/publications-data/checklist-hospitals-preparing-reception-and-care-coronavirus-2019-covid-19
5. CDC, "Hospital Preparedness Assessment Tool". Available from: https://www.cdc.gov/coronavirus/2019-ncov/downloads/hospital-preparedness-checklist.pdf
6. WHO (2020), Hospital Readiness Checklist for COVID-19. Available from: http://www.euro.who.int/__data/assets/pdf_file/0010/430210/Hospital-Readiness-Checklist.pdf?ua=1
7. Alves J. & Meneses R. (2018). Silos Mentality in Healthcare Services. 11th Annual Conference of the EuroMed Academy of Business - Research Advancements in National and Global Business Theory and Practice, Malta.
8. de Waal A. et al (2019). Silo-Busting: Overcoming the Greatest Threat to Organizational Performance. MDPI, Sustainability 2019, 11(23), 6860; https://doi.org/10.3390/su11236860
9. Malpass D. (2020). World Bank: Coronavirus highlights the need to strengthen health systems. Financial Times, 4 March. Available from: https://www.ft.com/content/41b75016-5e06-11ea-ac5e-df00963c20e6
10. Figueroa C. et al (2018). A Window of Opportunity: Visions and Strategies for Behavioral Health Policy Innovation. Ethnicity and Disease. doi: 10.18865/ed.28.S2.407
11. Birkmann J. et al (2010). Extreme events and disasters: a window of opportunity for change? Analysis of organizational, institutional and political changes, formal and informal responses after mega-disasters. Nat Hazards 55, 637–655. https://doi.org/10.1007/s11069-008-9319-2
12. Raven J., Wurie H. & Witter, S. (2018). Health workers' experiences of coping with the Ebola epidemic in Sierra Leone's health system: a qualitative study. BMC Health Serv Res 18, 251. https://doi.org/10.1186/s12913-018-3072-3
13. Agnes M. (2016). Information Silos are Hurting your Crisis Preparedness. Available from: https://melissaagnes.com/information-silos-are-hurting-your-crisis-preparedness/
14. Fenwick T., Seville E. & Brunsdon D. (2009). Reducing the Impact of Organisational Silos on Resilience. Resilient Organisations Research Report. New Zealand.

Facilitating the Reuse of Health Data

How Trustworthy is Hospital Data?

Health data dashboards have become the ultimate guiding tools in hospital board, management and staff meetings. Managers and clinicians looking for strategic, clinical and operational insights have understood the capacity of the massively growing health data stored in their patients' Electronic Health Records (EHR) to deliver real value-based care. An important success factor for the reuse of hospital EHRs is the quality of the data, a question which is often underestimated, as i~HD explains.

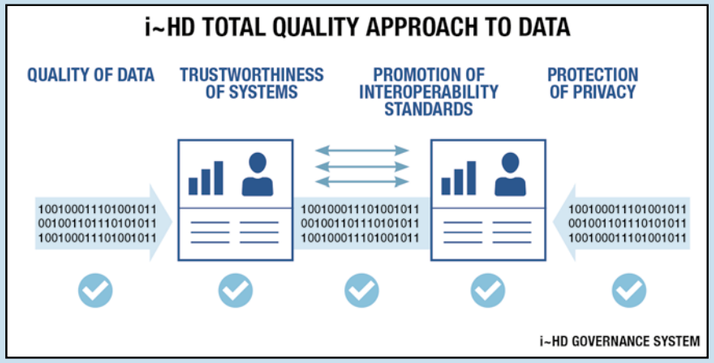
> It is great to use data. It would be greater to use great data!

DATA QUALITY IMPROVEMENT STRATEGIES

Hannelore Aerts, i~HD Data Quality Programme Manager: "Several studies have demonstrated that Real World Data today is of variable quality, and is often not fit for the intended reuse purpose. Hence, the present state of EHR data may turn out to be a less reliable source for optimal decision making. i~HD has therefore developed a Data Quality Service for Hospitals (DQS4H). This service entails a comprehensive data quality analysis coupled with customised data quality improvement strategies, tailored to the specific needs we observe within the hospital."

SCALING UP CLINICAL TRIALS OPPORTUNITIES

Furthermore, hospital managers want to scale up their opportunities to participate in clinical research. Good quality EHR data is increasingly important for industry and academic funded research, and is becoming a criterion for deciding which hospitals to choose for new clinical studies. Showcasing the quality of their EHR data can help hospitals to be more attractive to research sponsors.



The European Institute For Innovation Thr~ugh Health Data

GDPR COMPLIANCE

Treating health data as reusable assets inevitably raises questions as to patients' privacy and compliance with the GDPR. Nathan Lea, i~HD Data Protection Officer: "GDPR clarified various complex areas. We are nevertheless seeing uncertainty around how to honour patient consent to share personal health data. i~HD has therefore formed a GDPR Taskforce composed of leaders across Europe in law, information governance and security, engineering and regulatory oversight. Together, we are helping to provide best practice through tailored workshops and tutorials."

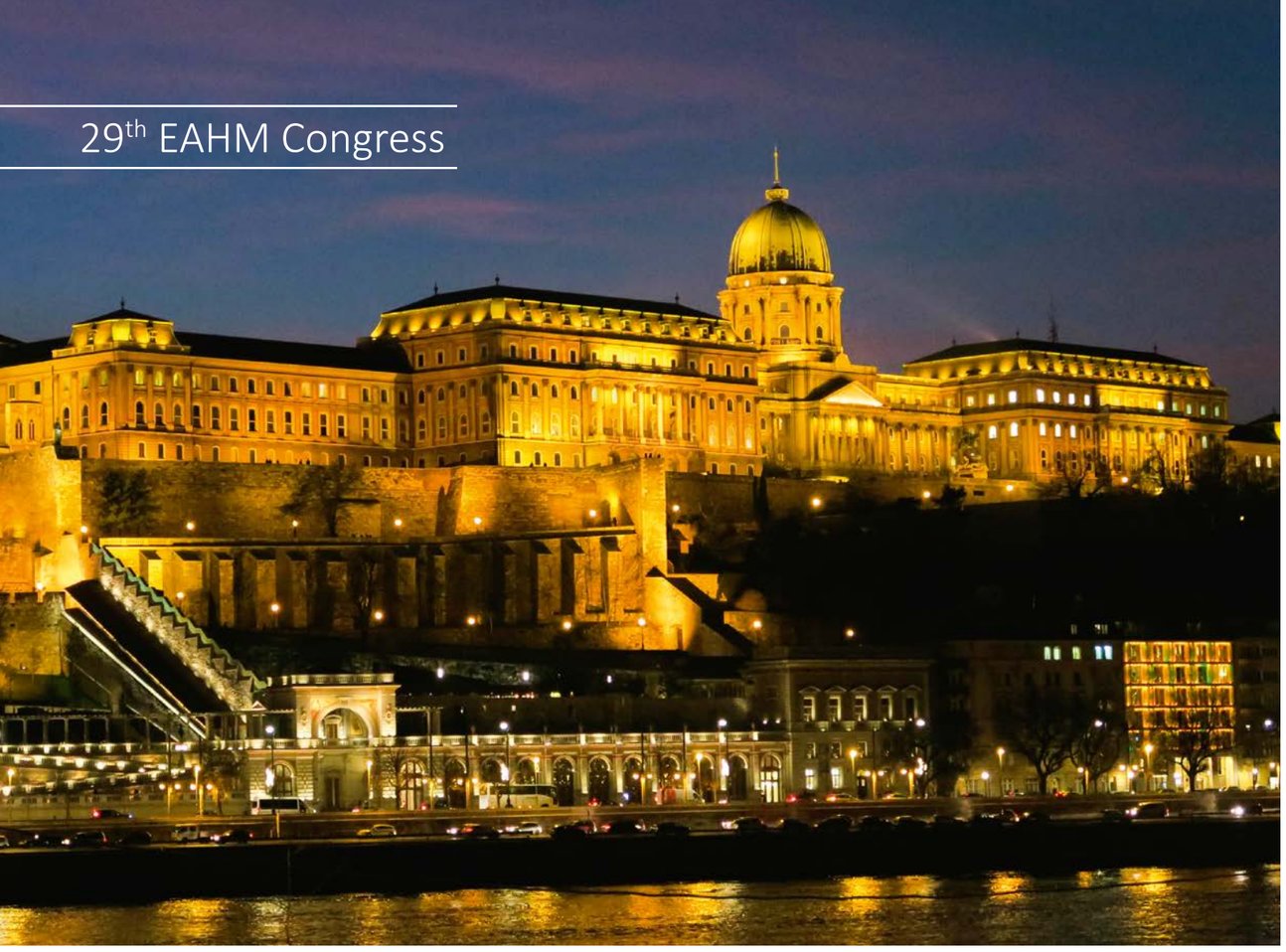
THE EUROPEAN INSTITUTE FOR INNOVATION THROUGH HEALTH DATA

The European Institute for Innovation through Health Data (i~HD) aims to enhance healthcare and research through better use of high quality health data. It has set up a health data governance ecosystem based on four complementary pillars:

- data quality assessment and improvement support
- the certification of specific components in EHR systems and research platforms
- providing training in information governance and GDPR compliance
- promoting interoperability standards.

Furthermore, i~HD strives to boost collaboration between stakeholders and knowledge sharing through conferences and awareness campaigns.

www.i-hd.eu



29th EAHM Congress

29th Congress of the EAHM

Budapest - Hungary - 2021

The 29th Congress of the European Association of Hospital Managers will be held in Budapest between 29 September – 1 October 2021.
The conference venue will be the Budapest Marriott Hotel.

Main topics:

- Dr. Who: The Future of Health Professional Education
- Ethics in the 21st Century
- Hospitals Go Green
- Future Technologies
- Innovation and Financing and DRG
- Big data and Informatics

30 SEPTEMBER - 2 OCTOBER 2020
29TH EAHM CONGRESS
BUDAPEST, HUNGARY

Of the host city

Budapest

Budapest is the capital and biggest city of Hungary, with 1,760,000 inhabitants.

The history of the city began with Aquincum that became the Roman capital of Lower Pannonia. Hungarians arrived in the territory of the present city in the 9th century. Their first settlement was pillaged by the Mongols in 1241. The re-established town became one of the centres of Renaissance humanist culture by the 15th century. From 1526 – the battle of Mohács – nearly 150 years of Turkish rule followed.

Afterwards, the region entered a new age of prosperity, and Budapest became a global city with the unification of Buda and Óbuda on the west bank and with Pest on the east bank of the Danube River in 1873.

Today Budapest is a leading global city with strengths in commerce, finance, media, art, fashion, research, technology, education, and entertainment. Budapest is cited as one of the most beautiful cities in Europe. The central area of the city along the Danube River is classified as a UNESCO World Heritage Site and has many notable monuments, including the Hungarian Parliament, Buda Castle, Széchenyi Chain Bridge, Matthias Church and the Liberty Statue.

Some Topics

Dr. Who : the Future of Health Professional Education

This topic will focus on recent shifts in the health and health care industry in terms of their implications for health professional education and workforce learning.

We plan to discuss opportunities for new platforms of communication and learning, continuous education of the health workforce, opportunities for team-based care and other types of collaborations. This session intends to explore the implications that shifts in health, policy, and the health care industry could have on health professional education and workforce learning, identifies learning platforms that could facilitate effective knowledge transfer with improved quality and efficiency, and discusses opportunities for building a global health workforce that understands the role of culture and health literacy in perceptions andapproaches to health and disease.

Linked to this topic, Professor Béla Merkely, Rector of Semmelweis University Budapest has invited his colleagues to participate in a European university rector's meeting to discuss the challenges of medical and health education, doctor-nurse competencies, and more. On the closing day of the congress, the rectors are going to present their findings to the European experts participating in the congress.

Informatics

Medical informatics is the intersection of information science, computer science, and health care. This session will deal with the resources, devices, and methods required to optimize the acquisition, storage, retrieval, and use of information in health and biomedicine.

We plan to cover the multidisciplinary field of informatics, decision support systems, telemedicine, ethics, consumer health informatics, international healthcare systems, global health informatics, translational research informatics, and home care, as well as the design and implementation of innovative applications and promotion of new technologies to improve health care.

Hospitals Go Green

The Path to Reduce Healthcare's Environmental Footprint

The health sector's mandate is to prevent and cure disease. Yet the delivery of health care services - most notably in hospitals - often inadvertently contributes to the problem.

Hospitals generate significant environmental health impacts both upstream and downstream from service delivery, through the natural resources and products they consume, as well as through the waste they generate.

Yet hospitals and health systems everywhere have the potential not only to adapt to the scourges of climate change, but also, in the process, to promote sustainability, greater health equity and environmental health through investing in healthier buildings, purchasing green, and implementing sustainable operations.

Indeed, hospitals and health care workers can be leading promoters of environmental health, by modelling environmentally sustainable, economically sound practices for the broader society and global community.

Pre-congress visits

Duna Medical Center (DMC)

The first comprehensive private health care facility in Hungary, DMC delivers patient centred ambulatory and inpatient health care services with the obligation to provide the safest care, treatment and services possible.

National Institute of Medical Rehabilitation

The institute's predecessor, the home of lung disease soldiers, opened in 1918. The area, also known as the lungs of Budapest, with rich fauna, plenty of sunlight, and good climatic conditions has provided a good chance for patients awaiting recovery. In the 1950s the profile of the institute gradually changed, and it became a recognized centre of locomotor rehabilitation and specialist training.

In 2000 the foundation stone of a new building was laid and the new main building was completed in 2004. Doctors continue complex rehabilitation of the patients with well-trained team members in a beautiful environment, in a 21st-century building.

Hospital in the Rock

The Hospital in the Rock was built in a natural cave system under the Castle Hill. During WWII a shelter and a first-aid place was built in the caves that was expanded into the Hospital in the Rock. It had three wards and a modern operating theatre. During the siege of Budapest in 1944-45 all 94 beds of the hospital were constantly filled, and patients were also laid in the halls and chambers of the surrounding cave system. HitR was closed in July 1945 but re-opened in 1956 to treat civilians and soldiers alike.

Between 1958 and 1962 the Hospital in the Rock was converted into a nuclear bunker. A safety-by-pass corridor was built, as well as a new ventilation system equipped with a special gas filter, and also a water supply system attached to the River Danube.

It was never formally decommissioned, and the Civil Defence Forces used it as a store.

In 2007 the facility was renovated. In 2010, the Ministry of Culture and Education classified it as a museum collection of public interest and now it functions as a national collection point for its specialist area.

Premier Med Healthcare Center

Premier Med Health Center is special in the Central European region with its unique tools and expertise for thyroid nodular patients and for those who live with varicose vein provides :

- Radiofrequency Ablation therapy to treat benign thyroid nodules (strumas)
- Endovenous Radiofrequency Ablation to help those with varicose vein problems
- Cryoablation therapy (freezing), allowing patients to have their fibroadenomas treated effectively without being cut or having to go under general anaesthetic. ■

EGVE - Association of Economic Managers of Health
More info : eahm-budapest2021.com

New Building Centre

LUXEMBOURG HOSPITAL CENTRE

PROJECT PLANNING — **PROJECT CONSTRUCTION**

2015 INVITATION FOR PROPOSALS (Call for tenders – July)
2016
2017
2018
2019
2020
2021 START OF CONSTRUCTION
2022
2023
2024
2025
2026 NBC DELIVERY
2027
2028 PROJECT END

In 2015, **"4bund Planungsgemeinschaft"** was awarded the task of designing the **"New Building Centre"** on the current site of the hospital as a result of its design being selected by the European architectural planning competition organized by the CHL. The members of the project management team combined their respective expertise to complete this ambitious project: combining state-of-the-art techniques with a modern and modulable, future-facing architecture which is also flexible enough to meet the expectations of the patients and professionals found in this type of complex. The new hospital will be located on the site of the former Maternity Hospital, along the route d'Arlon, between Val Fleuri and rue Pierre Federspiel.

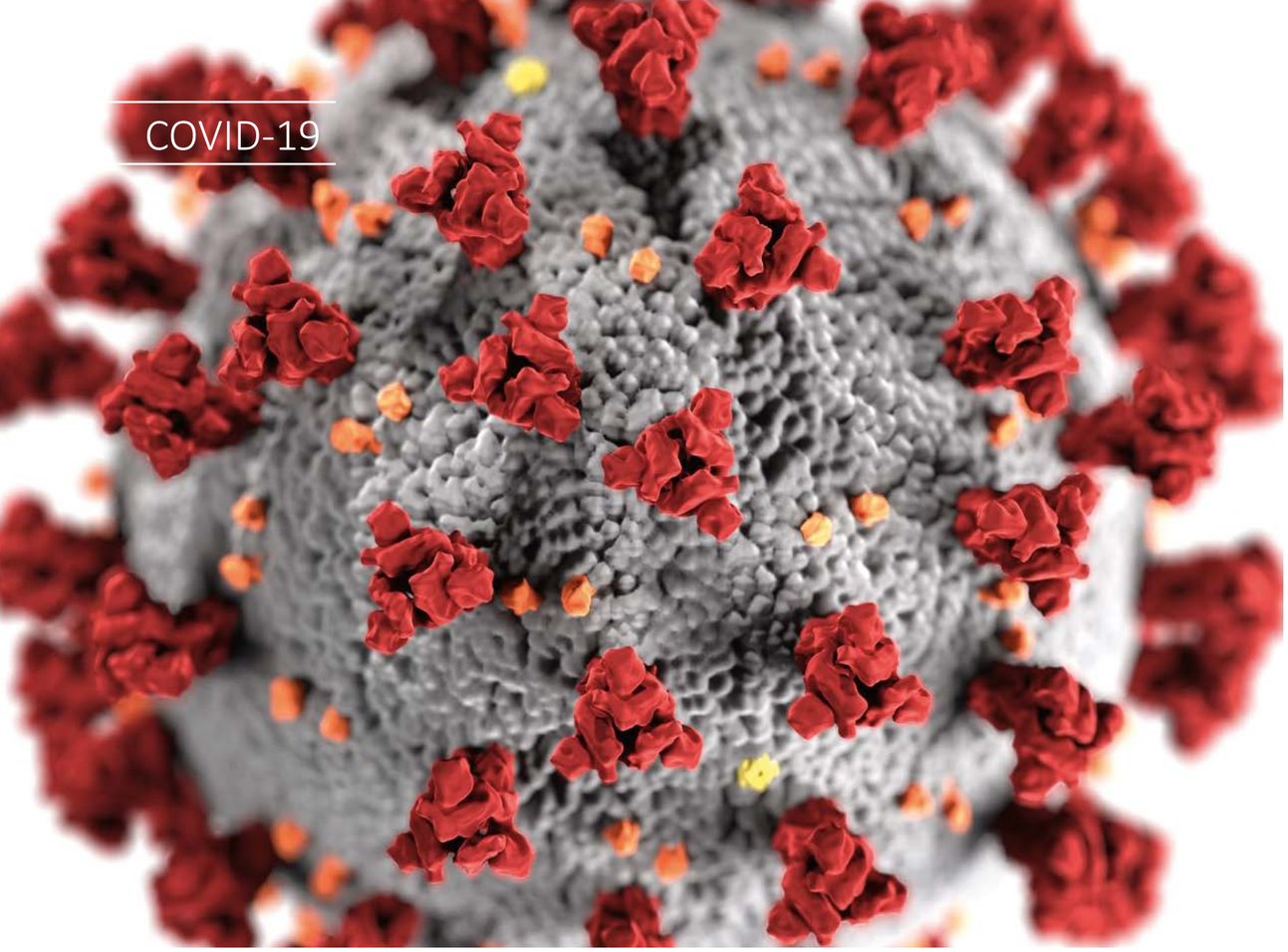
- Budget : Approx. 500 mio € incl. VAT
- Total surface area : 46000 m²
- 15 CHL operating rooms
- 3 INCCI operating rooms
- 444 CHL beds
- 20 INCCI beds
- 378 rooms including
  77% individual rooms
- 2 helipads
- Underground parking:
  469 parking spaces
- ER: Capacity of up to 315 patients/day

CUTTING-EDGE TECHNOLOGIES //
INNOVATION //
HUMAN DIMENSION //
MODULARITY //
SUSTAINABILITY //
FLEXIBILITY //

PROJECT MANAGEMENT TEAM

4 bund PLANUNGSGEMEINSCHAFT

ARCHITECTS	CIVIL ENGINEERING	TECHNICAL ENGINEERING	LANDSCAPE ARCHITECT
ARCHITECTES wörner traxler richter planungsgesellschaft mbH	BEST INGENIEURS-CONSEILS R&P RUFFERT Ingenieurgesellschaft Beratende Ingenieure	Goblet Lavandier & Associés Ingénieurs-Conseils S.A.	club L 94 landschafts architekten



COVID-19

Strategy to fight COVID-19

during the period from march to april 2020

Information collected and structured
by Marc Hastert, Secretary General of EAHM

[1] Department of Journalism and Communication Research, Hanover University of Music, Drama and Media
[2] Pfalzklinikum & "The Palatinate makes itself/you strong – Ways to Resilience"

Governments' strategy to fight COVID-19

France

The strategy of the government was to order the containment to clip the epidemiological peak. The goal was to prevent the intensive care beds from being saturated. France is a centralized state (no local policy about health).

Austria

Step I.: Lockdown to limit infections and evaluate the situation, while supermarkets and essential businesses (delivery systems, pharmacy, public-transport) were still open with restrictions. Step II.: Compulsory masks for supermarkets and co. Step III.: reopening of all businesses limited to an area of less than 400m2, except for hardware stores and gardening stores.

Germany

The first COVID-19 case was identified in Germany on January 27, 2020. On March 27, 2020 the law for protection of the population became effective in an epidemic situation of national scope. The new legislation empowered the Ministry of Health to issue ordinances in the (usually federal) healthcare system nationwide and without the consent of the Federal Council. The law applies as long as the government determines an «epidemic situation of national importance».

The massive efforts at all levels of the Public Health Service continue to pursue the goal of detecting infections in Germany as early as possible and delaying the further spread of the virus as much as possible. New infections should be avoided through social efforts, such as reducing social contacts in private, professional and public areas. The Federal Foreign Office does not recommend unnecessary trips.

The aim was to keep the number of ill people as low as possible and to delay it over time. This time was needed to increase the protective measures for particularly vulnerable groups and treatment capacities in clinics, to avoid overwhelming the health system and to enable the development of antiviral medicine and vaccines.

Greece

Early steps, in late February before a single death had been recorded, public meetings, events etc. were canceled.

On March 5, when there were 31 confirmed cases, schools, cafes, universities and many other businesses were ordered closed and telecommuting/teleworking has been adopted by a range of public services. All non-essential shops closed down (4 days after reporting the first death), the lockdown was on March 16 (including religion services). Pharmacies, Supermarkets and delivery systems are open with measures (social distancing, hygiene and for employees gloves-masks).

Greece suspended all flights with some exemptions. Exemptions include cargo, sanitary, humanitarian, state, military, ferry and Frontex flights, as well as flights in support of the Hellenic National Healthcare System, those for repatriation of Greek citizens and emergency flights.

The Greek government launched an extensive campaign informing citizens about the necessary precautionary measures and a daily press conference by the Health Ministry spokesman/head of the COVID-19 Scientific Committee.

The fatality rate per 100.000 inhabitants was only around 1,25 % and the transmission rate (or R0 value) was low (just 0.43), so the Greek government plans to start lifting the lockdown restrictions as of 4 May.

Hungary

The government ordered and strictly enforced curfew restrictions throughout the country. The government devoted significant resources to procuring protective equipment, masks, respirators and tests. These devices came from China via an air bridge. Protective equipment was available primarily to hospital staff, but there were still disruptions.

The country was prepared for the worst-case scenario of a pandemic. 50% of the capacity of the hospitals has been freed up. As a result, there have unfortunately been problems with proper home care for repatriated patients.

The curfew has been shown to be effective. The number of diseases was not rising drastically. The number of tests performed was low. To improve this, nearly 20,000 people were tested end of April under the professional guidance of medical universities.

The number of confirmed infections was close to 3,000. Nearly 1,000 patients were cared for in a hospital. Of these, 50 received mechanical ventilation. The number of dead was 300.

Iceland

On March 6th the Chief Epidemiologist and the National Commissioner of the Icelandic Police's Department of Civil Protection and Emergency Management declared the highest alert level — an emergency phase— as a result of the outbreak of the novel coronavirus that causes the COVID-19 disease. This was done in accordance with the Pandemic National Response Plan. These measures primarily affected key institutions and companies in Iceland, so that they took the action necessary to address the genuine threat stemming from COVID-19.

The objective of the measures taken by Icelandic authorities have from the beginning had a clear purpose, that is to ensure that the necessary infrastructure — particularly to include the healthcare system — can withstand the strain that the illness will cause in Iceland.

In the beginning the aim was to spread out the strain over a longer period so that healthcare institutions in Iceland can provide the best possible care to all (flatten the curve).

The main strategy had several components:

- Early definition of high-risk areas
- Quarantine requirements of all residents returning from areas abroad.
- Vigorous testing of symptomatic individuals
- Large-scale screening for COVID-19 in asymptomatic volunteers
- High infection tracing rate (over 95% to date)
- Quarantine requirements for anyone who has been in contact with infected individuals
- Home isolation for those infected
- The development of a prediction model for the number of individuals diagnosed with COVID-19 and the corresponding burden on the health care system.

Luxembourg

- Creation of a National Crisis Cell and local crisis cells in hospitals.
- Involvement of hospital actors at all levels. Involvement of hospital actors in the National Crisis Cell.
- Cancellation of scheduled non-emergency interventions.
- Hospitals restructured with COVID zones and non-COVID zones.

- Harmonized management with very limited access by visitors to hospitals. Patients were informed that they will have to designate a visitor who will be badgeged.
- Creation of Advanced Care Centers: these are itinerant treatment centers that have the medical equipment necessary for initial treatment. Emergencies should however respect the usual pathways in place in Luxembourg and not go through the ACC. However, if a patient sees his state of health deteriorate during his treatment at the ACC, a medical evacuation is planned. The ACCs were designed to operate by two strictly separate consultation channels: the first was designed to accommodate patients with signs of COVID-19 virus infection and the second allowed patients to come to the center without sign of COVID-19 virus infection.
- Acquisition of additional equipments:
  - Additional respirators
  - Additional computer tomographies (CT-scan)
- Procurement and distribution procedure according to objective, transparent and verifiable criteria. Acquisition of protective equipment via a National Logistics Unit following an agreement on standards for the use of this equipment.
- Development, together with hospital pharmacists, of a procedure for managing stocks and orders of drugs with a view to equitable distribution via objective criteria.
- Promulgation of new national regulation allowing the Luxembourg market to be considered as a single official hospital. This allowed us to be active on the Belgian market.
- "Grand Est" solidarity action: transfer to Luxembourg of French COVID patients requiring intensive care.

Northern Ireland (UK)

Northern Ireland followed the strategy of the UK Government as interpreted by the government of the devolved administration – the Northern Ireland Executive. The strategy development is informed by international experience and data, local academics, scientists and public health professionals. The strategy has followed the course of detection with testing and contact tracing when the numbers of people infected was small, followed by containment – a policy of social distancing – schools closed, working from home where possible and not an 'essential worker'; complete re-organisation of the hospital estate and bed capacity, e.g., – large hospital emptied and kept for COVID-19 patients only. The next phase was the introduction of much more intensive 'track and trace' with an app being tested this week in one part of England and recruitment of large numbers of staff to undertake contact tracing. In Northern Ireland there was also engagement with the Irish government,

public health professionals, the two Chief Medical Officers signed a 'Memorandum of Understanding' on public health matters and there is significant political, media and public interest in comparing strategies north and south of the border. There has been a significant operation by both police forces on either side of the border at Easter to ensure that people from Northern Ireland do not travel to their holiday homes in the north west of the island.

Norway

The national and local strategy was to lockdown to control and stop the spread of the SARS-CoV-2. People were asked to stay home; the schools and kindergartens were closed. Groups were maximized to 5 persons with a minimum distance of 2 meters inside and 1 meter outside. Use of a second house (ex. in the mountains for skiing) outside your community was prohibited. The main goal of the strategy was to reduce the load of patients needing intensive care in hospitals.

Switzerland: All people except those from the Principality of Liechtenstein were not allowed to entry into Switzerland. Exceptions were possible, for example for people who live or work in Switzerland.

Meetings of more than five people were forbidden. If five or less people met, they had to keep a distance of at least two meters. Failure to this order resulted in a fine. There was no curfew in Switzerland.

Classroom teaching at schools, universities and other educational establishments was prohibited.

All shops, restaurants, bars, entertainment and leisure facilities were closed.

Since 13 March only Hospitals may perform urgent surgeries and treatments. Visitors were not allowed in the hospitals.

As from, 27 April, the hospitals were allowed to restart with normal surgeries and carry out non-urgent treatments and operations.

The strategy towards the population

France

The strategy was the containment. During the containment, from 17th of March to 11th of May, only shops selling basic necessities remained open. The others (library, heardressers, restaurants…) were closed. Schools were closed. People could only go outside to work, to go to shop, to go to an administration, to a short walk or a footing. Many companies were closed and there was less public transport.

From the 11th of May the reopenings were progressive. At first shops, businesses, schools

for younger children reopened. Then schools for older children, restaurants and pubs. Then theaters, concert halls, cinemas.

Into the land with few sick, the strategy was to identify them and to follow their contacts to try to keep the cluster under control. It was also the strategy after the containment for all the population.

Austria

Mask wearing was compulsory for everyone in the public.

Germany: Since April 27, 2020 wearing a mask did apply in public. It was especially recommended during grocery shopping and in public transport.

So far, shops which are not necessary for daily activities were closed. Due to loosing of the restrictions, some shops could reopen under special circumstances. By wearing a mask and keeping the general social distance of 1,5 meters, people were allowed to visit smaller stores. Coffee bars and restaurants had to remain closed but could offer food and drinks for take away.

After lengthy discussions, the government agreed on loosing the rules for social distancing. Due to the different situations in the individual federal states, it was up to them to interpret the eased regulations.

Greece: Along with 2 meters physical distance rule, masks and gloves were compulsory, allowing to proceed to the second phase of plan by the gradual easing of restrictions, in all closed places (banks, supermarkets, public transport, etc). However, some stores opened to public only via appointment and strict rules. The restart of operations up to this point involved about 10% of those businesses whose operation was suspended.

Hungary

Communication about wearing a mask was not clear in the first period. The rules have been clarified. Great emphasis was placed on social distance. Groupings and, of course, public events were prohibited. Hotels and restaurants were not allowed to receive guests. The restaurants only served takeaway food in full compliance with hygiene rules.

From end of April, travelers on public transport in big cities had to wear a mask.

Public awareness of defense was not strong enough. Bypassing and circumventing the rules had become a „national sport" in many places. The authorities took firm and consistent action against this.

Iceland

- Continued emphasis on simple infectious control measures such as washing and disinfection of hands and social distancing.

- Ban on larger gatherings (20-person limit from March 24th to be changed to 50-person limit from May 4th)
- Social distancing – 2-meter rule
- University and upper secondary school-closures. Limited opening of elementary schools and preschools.
- Active communication with the general public, including daily press briefings
- Access to information via the covid.is website with all current and relevant information continuously updated in nine languages.
- Advertisements promoting hygiene, awareness, common responsibility.
- The premise for these actions was the creation of a community-wide consensus: that we all agree to follow expert advice and participate together in this endeavor. Infectious diseases affect individuals' health, but they also affect the well-being of the entire community. Civil protection is in our hands.

Luxembourg

- Relative containment; ban on gatherings, closing of shops (gradual reopening from April 20, 2020), etc. but possibility of traveling for professional reasons and for essential purchases, gradual reopening of schools from May 4, 2020.
- Obligation to wear a mask in stores and public transport from April 20, 2020.
- Patients who leaved or have left the hospital could be followed via an app set up by the Health Inspectorate.
- Kits with protective equipment were given to patients when they leave the hospital.
- Psychological support for COVID19 patients who are in a state of panic (Teleconsultations with psychiatrists and psychologists). For hospital staff, there were internal psychological monitoring procedures.

Northern Ireland (UK)

The UK Government has not supported the wearing of masks in the general population citing lack of evidence for their effectiveness, the risk of complacency in social distancing which their wearing might bring about and the risk to supplies of masks for healthcare workers (HCW).

Norway: In Norway the authorities did not recommend using facemasks, but frequently wash hands and surfaces with soap and/or disinfection solutions.

Switzerland: The Federal Council recommended wearing face masks in fully occupied trains. In Switzerland there was no mask obligation. All individuals with symptoms of acute respiratory disease with or without fever, muscle pain or loss of smell or taste were tested for Covid-19.

The availability of masks

France

In 2009/2010 the Health Minister, Roselyne Bachelot, bought a lot of masks and vaccines in anticipation of H1N1 flu. They have been little used because, fortunately, the flu has little affected France. So she was harshly criticized by journalists and politicians who said she spent money for nothing. So her successors have given up keeping a strategic mask stocks and at the beginning of the epidemic there was not even mask for population.

The goal of the government was to have enough mask at the end of the containment.

But a lot of them will be reusable cloth masks.

During the crisis, a lot of companies and individuals started making masks and even plexiglass visors.

Austria

The government waited to introduce compulsory mask wearing until Austria had enough masks for now and the future.

Germany

Since the introduction of mandatory masks in Germany, many people have started producing face covering (DIY-masks, non-certified) for the population. Certified masks were difficult to access for the population. So overall it was possible for everybody to get a mask when needed.

Greece

A large Greek company started the production of large quantities of masks in two different regions, with a production amounting to approximately nine million masks per calendar month.

Hungary

Numerically, there were enough masks in the country. Given that this set was provided primarily to health workers and social institutions, their availability to the public was limited.

Local governments provided masks to the population at their own expense, but this was not enough. In smaller settlements, mainly homemade masks were available.

Iceland: The public was not advised to use masks or gloves in their daily lives. The use of such protective measures could provide false sense of security and reduce the level of awareness needed to sustain proper infection control measures (hand cleansing and social distancing).

Luxembourg

- At the beginning of the epidemic, shortage of masks (dependence on other countries outside of Europe).
- Massive arrivals of masks from the second half of April 2020.
- Reflections and actions for local manufacturing.

Northern Ireland

At the end of April, there has been some softening of the policy in briefings from the UK government and some leading public health commentators. The Scottish government has recommended that people use face coverings when in shops and on public transport although this is not compulsory and suggests that people use cloth coverings such as a scarf, rather than 'medical grade face masks' and no face coverings should be used for children under the age of two years. Advice for England, Wales and Northern Ireland did not change and masks have not been recommended.

Norway: No shortage of masks.

Switzerland

No shortage of masks. Starting end of April, the government supplied one million hygiene masks daily for two weeks to leading retailers to support the sale of masks to the population.

The availability of masks and personal protective equipment for health professionals

France

In March, there was supply disruption, mostly for masks and aprons. There were many pro-

blems in some hospitals and mostly for city health professionals. Therefore, the government took the hand on masks production and distribution and many local administrations bought masks in stranger countries. At the end of March, there was no more masks disruption for health professionals. The aprons were still a problem. There was still problems in April with aprons.

In March, it was also hard to find hydro alcoholic solution, but only during a short time.

Austria: Problems with primary health centers and nursing homes. The nursing homes were criticized for not being sufficiently restrictive.

Germany

In March and April masks in hospitals were scarce. The prices rose extremely. Masks have been available again for around 2 weeks. There was also a shortage of virus-proof protective gowns. The prices of various masks and protective coats were significantly higher than before the crisis.

Greece

While early, in the outbreak-related global PPE shortage, the lack of PPE was alarming, impacting the COVID-19 response, Greece's NHS received equipment donations (and millions euro) from leading companies and individuals. The majority of PPE needs were consistently met, through market.

Hungary

The availability of protective equipment for heath professionals was constantly improving. In the first period, however, there were serious supply disruptions. This was also due to the fact that more than 10% of those infected were healthcare workers. There was a serious problem in GP care.

Iceland

There was an abundance of surgical masks throughout the pandemic but the situation was of concern regarding the state of supply of FFP2 and FFP3 masks as well as face shields. It was however possible to procure adequate supplies in time to last through the current pandemic and to at least sustain another wave of the same size.

Luxembourg

- Constitution of a National Logistics Cell in coordination with the National Crisis Cell.
- Production of protective equipment by some hospitals.

Northern Ireland

There have been challenges along the way however the UK Government agency – Public Health England has constantly updated guidance to ensure clarity on what PPE should be used by whom and in what context. In Northern Ireland we had effectively harnessed infection control expertise to work with front-line clinicians to help manage supplies. We also had effective procurement, logistics and supplies teams linked to the UK supply chains and a policy of pushing out supplies, constant monitoring of supplies against need, redistribution of supplies, 'mutual aid' between hospitals; collaboration with other sectors which use PPE, universities, manufacturing have all

contributed to innovation including 3D printing of visors and other useful equipment to avoid serious problems.

Norway

During a period there was some shortage, but as the rate of new cases declined, the supplies were sufficient.

Switzerland : There was enough material and the stocks were refilled continuously.

The biological screening strategy (Polymerase Chain Reaction – PCR, serological tests, …)

France

In France the government asked to use PCR, because serological tests had not good results. But even with PCR there was a lot of false negatives because the sensitivity of the test is between 65% and 80%. Fortunately, the doctors learned to identify the disease with physical examination and scanner.

At the beginning, the strategy was to test in priority symptomatic patients and symptomatic care professionals.

When more testing were available, the government added people and professionals of the housees for the elderly.

After the containment the strategy was to test every symptomatic people and their contact persons.

Austria

Until 28.04.2020, there was a total standing of approximately 240.000 tests. The aim was to have as tests as possible. Currently Austria was not reaching its expectations in terms of the total tests. People, who are classified as a risk group, and people with severe symptoms were prioritized.

Germany

In Germany the reverse transcription polymerase chain reaction (RT-PCR) was applied. The criteria who will be tested were adjusted multiple times. Therefore, not all people were tested for the corona virus. Up to this point following people were preferred:

- people who show typical flu-like symptoms

AND

- either contacted a proven corona infected person
- suffer from pre-existing conditions
- people with worse getting respiratory problems
- or count to the group of people staying in close contact to patients or older people with a higher risk of a serious course of COVID-19

Greece

All people with COVID-19 symptoms were tested, using the PCR tests. On May, where the second phase of plan started, government planed the roll out of 500 mobile units to check potential cases. So far, no other test (serological or rapid) were consider to be valid by Greek authorities.

Hungary

The number of tests performed was low in European comparison. The government initiated a change in strategy in this area and increased significantly the number of tests, in which medical universities also provided assistance. The aim was to determine the infectivity of the population on the basis of a representative sample.

Iceland

The strategy was to test as many as possible, both symptomatic persons and screen the general public. It was possible to perform the appropriate PCR in the beginning of February.

The first positive test result came in on February 28th. Close to 50.000 tests were done yielding 1800 positive tests. In the last days of April, there were several days with no positive tests despite continued testing efforts.

Luxembourg

- Collection of data necessary to plan the deconfinement stages.
- Large-scale PCR testing.
- Serological tests: Test a sample of the population with COVID-19 antibodies → blood tests on a representative sample of the population.
- General recommendation in hospitals: to be able to carry out at least once a week a PCR test for all the staff (provided that the tests are available!).
- Start of a large-scale screening campaign from May 19, 2020 → for the entire population, including border residents.

Northern Ireland

The UK government published a testing plan on 4th April 'Coronavirus (COVID-19) Scaling up the testing programmes https://www.gov.uk/government/publications/coronavirus-covid-19-scaling-up-testing-programmes

This seted out the 5 pillars:

Pillar 1: NHS swab testing for those with a medical need and the most critical workers (this is PCR testing, developed and delivered in hospital laboratories, introduced mid-March)

Pillar 2: Commercial swab testing for critical key workers in the NHS, social care and other sectors. (This is a drive-through arrangement in local arenas, arrangement with 4 UK diagnostic companies – for N. Ireland this is Randox – an international company founded and HQ in N. Ireland.)

Pillar 3: Antibody testing to help determine if people have immunity to the coronavirus (under development)

Pillar 4: Surveillance testing to learn more about the disease and help develop new tests and treatments (commenced in pilot phase in N. Ireland last week, app being tested in one part of England this week, large scale recruitment of contact tracers intended).

Pillar 5: Diagnostics national effort to build a mass-testing capacity at a completely new scale (to meet the demands of the 'track and trace' strategy)

Norway

PCR

Switzerland

All individuals with symptoms of acute respiratory disease with or without fever, muscle pain or loss of smell or taste were tested for Covid-19. The Federal Office of Public Health in Switzerland not advised rapid and serological tests. Only the so-called PCR test was reliable for the diagnosis of Covid-19.

Capacity of biological screening tests

France

It was very difficult to find reagent, collection kit and good bacterial culture medium. During the first weeks there was a lot of disruption. And because the best tools were missing, the sensitivity of the tests decreased. In April the situation became better, step by step, with no more disruption at the end of the month.

Austria

There could be more capacity.

Germany

Up to the middle of March 35.000 people have been registered for taking a sample. Since many people could not be tested, the test capacity has been increased to over 700.000 tests per week.

There were local differences between the amount of available corona-tests in the federal states. A larger number of infections increases the chance of running into a squeeze. Other regions carried a larger stock of free capacities.

Greece

The capacity was in place, according to national testing strategy, but it also depended on how effectively authorities can acquire necessary material like reagents from the market. Testing had to be much more widespread for confidence to prevail and for the refugee camp's needs.

Greece has suggested EU member states jointly buy patent rights for vaccines against COVID-19 and rapid tests under development to help ensure that if they are effective they are quickly distributed to those in need across the bloc.

Hungary

An adequate amount of biological testing was available.

Iceland

The supply of the preferred viral swabs was below the optimal state at one point. However, there was an abundance of other types of swabs that could well be used as an alternative. There was a critical point with reagents at one point which resolved quickly.

Luxembourg

- Capacity was increasing.
- Not everything was in stock, but there were more and more systematic screening campaigns (eg in institutions for the elderly people).

Northern Ireland

Tests were initially provided by the central virology lab, then testing capacity developed in other hospitals largely focused on testing symptomatic patients and healthcare workers. A UK wide consortium of four diagnostic testing companies has collaborated with the UK government to create additional capacity – see the 5 pillar strategy above. The testing capacity has therefore been prioritized and as it is expanded testing is provided to more people and strictly controlled.

Norway

After some time, the capacity was increased to a sufficient level, but it was necessary to prioritize.

Switzerland

There was enough testing capacity. That also depended on the government's testing strategy.

Beds for inpatients (intensive care and other)

France

The 16th of March, the Health Minister asked to all the hospitals to stop scheduled activity, to open covid19 units and to try to triple the number of beds in intensive care. So there were enough beds in all the country.

The only problem was in the two regions more affected by the disease: Alsace-Lorraine and Paris and its suburbs. In this regions, there were not enough intensive care beds, so they had to send patients in the other regions of

France. Some patients of Alsace-Lorraine also went to Germany, Switzerland and Luxembourg before the government organized the distribution of patients in France.

Austria

Enough beds for both intensive and other.

Germany

Before the Corona crisis, there were 28.000 intensive care beds nationwide in Germany, including 20.000 beds with ventilation options. These were occupied on average with a quote of 70-80 percent.

Greece

When the pandemic broke, the Greek public hospitals had only 605 intensive care units, of which only 557 were in operation due to staff shortages. Government took almost all the possible measures to strengthen the national healthcare system, even if during this period the largest number of incidents needed ICU-care was 93. Hospital beds, at the referral hospitals throughout the country, have been always enough to address possible incidents of coronavirus in Greece.

Hungary

The government has released 50% of the available bed capacity. This was sufficient for the expected benefits even in the worst case scenario.

Iceland

The numbers of positive tests per day and the forecast model among other things were used to help plan for several scenarios. Part of the plan was to stop all elective surgery and invasive procedures to free up beds and other resources. Icelandic hospitals followed the most likely forecast for the need for general hospital beds but a slightly worse forecast for ICU beds. Worst case scenario would have exhausted the ICU beds but all the measures taken by the government to spread out the strain combined with a novel ambulatory/ urgent care service developed specifically around Covid19 patients (see item 12) helped match the hospital´s capacity to the demand.

Luxembourg

- Enough beds as long as the national COVID strategy bears fruit.
- Reserves of beds and available equipment had to be maintained.

Northern Ireland

A Northern Ireland wide Surge Plan was developed, much elective surgery was postponed, discharges expedited and one large hospital in Belfast converted to COVID-19 only and considerably increased intensive care capacity created. 'COVID-19' centres staffed by General Practitioners (GPs) were created to treat ambulatory patients with suspected COVID – 19 thus avoiding presentation to ED or hospital admission. All of these measures have resulted in sufficient capacity being available to admit where necessary and retain sufficient spare capacity for any surge.

Norway

Enough beds.

Switzerland

About two thirds of COVID 19 beds haven't been used in the whole German-speaking Part of Switzerland since the beginning of the crisis. In the Italian and French Part of Switzerland, all the beds have been used at any time, but there have always been enough beds, to deal with the epidemic.

Number of intensive care beds

France

The number of intensive care beds was tripled.

Austria

The number of intensive care beds didn't change.

Germany

Bed capacities were expanded in all regions in Germany. Elective admissions were postponed in order to keep further capacities free. In addition, further ventilation places were created in the hospitals and additional ventilation devices were purchased. The number of intensive care beds has been increased to 40.000 beds and ventilation places to 30.000 beds.

In addition, further wards enabled more intensive treatment options. Hospitals upgraded treatment capacities so that significantly more seriously ill and ventilated patients could be treated. The government was supporting the purchase of medical technology in the field of intensive care.

Greece

Greece managed to almost double the number of ICU's beds.

Hungary

The number of intensive beds was expected to be sufficient. Significant improvements have been made here. Several mobile hospitals have been established in preparation for the increased demands.

Iceland

Iceland had a fairly low number of ICU beds per capita in a normal situation for a variety of reasons. During this pandemic Icelandic hospitals made plans to increase the numbers almost fourfold. They made plans to use recovery areas and surgical suites as ICU facilities.

Luxembourg

- The number of intensive care beds was increased. In parallel, increasing of the number of "respirator" equipments, etc.

- The number of intensive care beds doubled during the COVID crisis. Intensive care beds also remained for other pathologies.

Northern Ireland (UK)

In N. Ireland increasing of the number of intensive care beds by c. 60% by creating additional ITU capacity within existing hospitals. A 'Nightingale' Hospital (ref. Florence Nightingale) was created in London in 9 days in early April, in an exhibition centre, with the help of the army (one of 17 'field' hospitals across the UK with locally relevant models of care). The intended capacity of the London Nightingale was 2,900 intensive care beds and 750 further beds. The combined, normal compliment of intensive care beds in London, that is, within hospitals, is approximately 770, this was doubled to 1,555. Newspapers to-day reported that these are scaling down due to lack of admissions. Sir Simon Stevens, Chief Executive of the NHS was quoted as saying that it would "count as a huge success for the whole country if we never need to use (the Nightingales), but with further waves of coronavirus possible it is important that we have these extra facilities in place and treating patients"; "it makes sense to hope for the best but nevertheless to prepare for the worst".

GLOBAL RISK MANAGEMENT: A FUTURE SOLUTION FOR HOSPITALS

Sham (Relyens group) is the leading medical malpractice insurance company in France, Spain and Northern Italy. Founded in 1927 by hospital directors, Sham offers its European clients in the healthcare and medical-social fields unique expertise in risk management (clinical and medical risks, together with cyber, personnel and operational risks). What are the developments facing the hospital sector? And how can they be addressed? Interview with CEO Dominique Godet.

- Your experience working alongside European hospital directors gives you keen insight into the sector. In your opinion, what major challenges are there today?

Dominique Godet: "There are many challenges to be overcome. With structural budget constraints, growing challenges in terms of regionalised organisation and the digitalisation of practices, important changes are underway. At the same time, patients see themselves as "consumers of care" and increasingly call medical practice into question, while the legal framework continues to evolve along with developments in case law. While the changes in the sector open up real opportunities to improve health systems, particularly in terms of patient safety and the performance of organisations, they also create new risks."

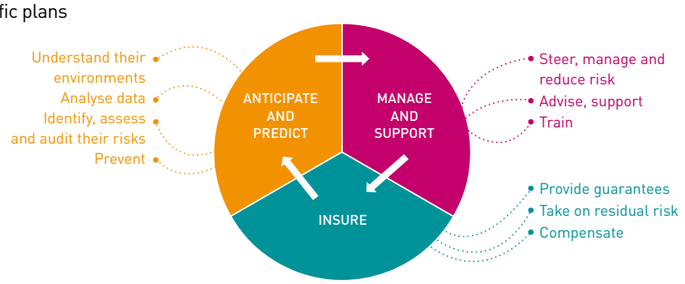
COVID-19: SHAM IN ACTION

- Hasn't the Covid-19 crisis been a kind of "stress test" for Sham? In what ways have you helped to safeguard your clients' public interest missions?

D.G.: "The Group very quickly organised itself to ensure service continuity for its clients. We activated specific plans for clients across Europe, enabling them to benefit from extended warranties under their medical malpractice insurance policies and offering solutions to ward off cyberattacks during this period. We further increased our support by introducing flexibility into management rules and claim processing times, as well as offering guidance and psychological support."

- As an insurance expert, your Group has progressively extended its scope of expertise to include risk management. Why do you consider this upstream work to be essential?

D.G.: "For many years, the Group has implemented a global approach to risk that goes well beyond paying compensation for damages. In addition to offering insurance, our multidisciplinary teams engage with our clients to help safeguard their activities, particularly through preventive work involving the provision of information, training, advice, and risk audits. This upstream work is absolutely fundamental. It is a way to identify and assess risks so that they can be managed and reduced more effectively by implementing targeted corrective action to improve the safety of patient care, enhance employees' quality of life in the workplace and, potentially, reduce the client's insurance premium. As a specialist insurer for healthcare institutions and professionals, Sham is now positioning itself as a dedicated Risk Manager for these clients, supporting them in their day-to-day work with a wide range of targeted solutions. This approach, unique in Europe, is part of a virtuous cycle that creates value at different levels: human, financial and operational."



SHAM: A HIGH-TECH AND CULTURAL TRANSFORMATION

- The world is changing very quickly, particularly the technology world. What is your strategy to address the changes underway?

D.G. : "Given the rapid transformation underway in our clients' environments, practices and healthcare offerings, we recently expanded our range of solutions to take our response to the next level. To this end, we have established exclusive partnerships with leading international technology companies. Our new solutions are based on the use of data and artificial intelligence and target 3 risk areas: the identification and prevention of **cyber risk** (via our partners CyberMDX and aDvens), the reduction of **clinical and medical risk** (via Caresyntax and CLEW) and the prediction of flows of **activities and personnel** (via Amalfi and HEVA). This means that we can now predict certain risks even before they occur (patient flow, deterioration in a patient's health, employee absenteeism, etc.), as well as identifying and acting on risk in real time (correcting an operating technique in the operating room, tackling a cyberattack on a medical device, etc.).

In addition, we are transforming our Group from the inside in order to build technology into our businesses and practices. In recent years, this transformation has involved welcoming new talent on board, such as data scientists and cyber risk experts."

> **« The Group provides a comprehensive range of solutions to support its clients' risk management systems and performance. »**

- Would you say that the values that guide Sham also ensure that its clients benefit from that «special personal touch» that has become its signature?

D.G. : "Our mutualist model and values (sharing, optimism, equity, responsibility) guide us on a daily basis in our long-term relationships with all our stakeholders. Our objective is to actively contribute to the development of our client ecosystem. We foster close, constructive two-way relationships with our many partners - such as federations and associations in the health care and local authority spheres - as well as the organisations that contribute to their development and growth (learned societies, think tanks, unions, schools, etc.) in France and Europe. We also promote innovation, expertise and value creation through the investment policy we implement to foster innovation in the healthcare field. Through this unwavering commitment, we can help to improve the quality of our clients' general interest missions for the benefit of patients and citizens. This is the highly meaningful mission that drives our day-to-day work and is a source of pride for all Group employees."

SHAM, A RELYENS GROUP COMPANY.

The Relyens group supports

9,000 HEALTHCARE FACILITIES IN EUROPE

In 2019, it reported revenues of

€484 MILLION FROM **€891 MILLION IN PREMIUMS** COLLECTED.

With nearly **1,000 employees**, **over 30,000 clients and members** and **900,000 policyholders in four countries** (France, Spain, Italy and Germany), Relyens is a leading European mutual insurance and risk management group serving healthcare providers and local authorities that perform a public interest role. The Group is firmly established in its clients' environments through its brands Sham, Sofaxis and Neeria and develops comprehensive tailored solutions combining insurance (personal and property cover) with risk management services.

Twitter : @Sham_France
Linkedin : SHAM

WWW.RELYENS.EU / WWW.SHAM.FR

sham
INSURANCE AND RISK MANAGEMENT
a relyens group company

Norway

The number of intensive care beds was doubled.

Switzerland

Switzerland has a total of 82 hospitals, clinics and hospital groups with intensive care units, with between 950 and 1000 beds. Due to the corona crises the capacities of beds have been expanded to 1200. Around 800 to 850 of these had respiratory equipment.

Human ressources to manage the epidemic

France

France had enough human ressources because the French hospitals stopped scheduled activity. Therefore, a lot of beds were closed and their human ressources were used for Covid-19. Medical students and nurses students were also involved, as well as some retired doctors and nurses (volunteers to help).

Austria

The virus could cause a shortage in the future. Austrian hospitals also had a great number of volunteering people as it is part of a program in Austria (civil service and Austrian military).

Germany

Time pressure and a shortage of staff have become almost normal for hospital staff and their patients. This situation was a major challenge in the COVID-19 pandemic. Over 10.000 medical students have networked and exchanged information and calls from clinics. The students could not replace doctors, but they could help in the hospitals and relieved the specialist staff. The emergency plan at the clinics initially planed to increase part-time positions internally or to postpone vacations. Later, the top priority was to reach as many people as possible and prepare everything for the crisis. Numerous calls were made to find the appropriate staff. In addition, many elective procedures were canceled in order to keep the beds required for COVID-19 patients free and to employ more staff for these patients.

Greece

Before the pandemic, austerity cuts meant that the Greek National Health System was already facing systemic shortages of personnel. Greek government has decided to accelerate the recruitment of health personnel as one of the alert measures of the country to deal with the outbreak. So far, more than 3.000 doctors, nurses, paramedics, lab specialists, etc., were recruited to fill personnel shortages.

Hungary

Human resource supply can be critical. Infections in hospitals quarantine workers and there are many proven infections. Physicians over the age of 65 had limited access to care. Nearly 65% of GPs were over 65 years old. However, it was possible to redeploy staff between individual institutions as needed.

Iceland

Icelandic hospitals moved a lot of staff around such as surgical and anesthetic nurses, residents

and senior physicians. Every health care worker who was freed up from their usual tasks because of immense changes made in the service delivery was utilized in one way or the other - all hands were on deck. There was an appeal made by the health authorities to health care providers working outside healthcare or even newly retired to come back and help. The biggest threat was shortage of experienced intensive care nurses.

Luxembourg

- Creation of a "Health Reserve".
- Transmission of lists of personal data of employees or former employees to the Ministry of Health for the management of the health reserve and the verification of authorizations to practice.
- The health professionals made available by the health reserve had a remunerated contract as an employee of the State → (Legislation of March 27, 2020) allowing people belonging to a medical or paramedical profession to be employed on a fixed-term basis as an employee of the State for the needs of managing the health crisis.
- The employer could refuse a leave request and cancel a leave already granted.
- Organization of a hotel accommodation offered for staff and families in the hospital sector (residents and border residents).
- Formalization of a legislation, which dispensed with carrying out medical examinations on the hiring of employees during the crisis period in the context of occupational medicine.

Northern Ireland (UK)

Surge plans' including standing down a considerable amount of non-COVID-19 activity and staff were redeployed and upskilled where necessary to deal with COVID-19 patients. Where staff were unable to work due to having COVID-19 symptoms they were prioritized for testing so that they would be able to come back to work. There was a UK –wide call for volunteer staff including recently retired doctors, nurses etc. or lay people who could carry out non-clinical tasks. There has been some use of these people but they have not been required in the numbers anticipated. There have been staffing pressures on care homes as staff have become ill or required to self-isolate. Hospitals have provided replacement staff and additional skills where necessary.

Norway

Enough human ressources because the load of patients has not been too high.

Switzerland

Enough human resources to manage the epidemic.

Guidelines for good practices between healthcare teams and physicians in the context of the COVID-19 crisis

France

The Health Minister send a lot of guidelines to the hospitals and the professionals.

Austria: Overall.

Germany

The recommendations of the Robert Koch Institute (RKI) were relevant for the treatment of patients and the handling of the coronavirus. All hospitals were requested to observe the current information from the RKI and the

Federal Center for Health Education and to make it available to employees and patients. The RKI was providing extensive recommendations for the contact to people being sick with COVID-19. The RKI dashboard-COVID-19 provided an overview on the dynamic behavior of new infections on a daily base. In case of a pandemic, the clinics have clear defined plans. The practical implementation of such plans is regularly trained.

The main measures are:

- Information and training of employees
- Examination of stocks and stockpiling with personal protective equipment, pharmaceuticals and virus-destroying disinfectants
- Information for patients and visitors
- Construction of isolation areas
- Set up access controls
- Tests and measures to expand capacity
- Furthermore several institutions activated a web page called DIVI, showing hospitals with free capacity for ventilation. The hospitals were linked in a network and gained an overview of free beds.

Greece

Guidelines provided by the National Public Health Organization (NPHO):

https://eody.gov.gr/en/

Hungary

Appropriate professional protocols, primarily based on WHO guidelines.

Iceland

Icelandic hospitals used guidelines from the office of the Chief Epidemiologist, from ECDC, WHO and CDC.

Luxembourg

- Guidelines established ad hoc in collaboration with the National Crisis Cell.
- Development of a guide to good practice between healthcare teams and doctors in the context of the COVID-19 crisis.
- Each hospital had to contribute at the level of its local ethics committee. Guideline between hospitals on criteria of access to care.
- Development of a common procedure based on existing recommendations sent by hospitals. The degree of protection of human resources depends on the equipment available (approach developed with the collaboration of hygienists from hospital centers).
- Teleconsultations; looking for a single system for the whole country.

Northern Ireland (UK)

Staff have been unstinting in their commitment to flexibility and working together during this team. In addition, in Northern Ireland health and social care staff and primary care teams were combined all within the same governance – all public health and social care system, independent contractors are managed by the same regional authority etc. This has helped understand the plans and challenges through all stages of COVID-19 patient's experience and enable collaboration to support staff and facilities where necessary. Official guidelines were provided across the UK by 'Public Health England', considered locally and where necessary amendments are incorporated. Locally hospitals had guidelines and there was good sharing between organisations, for example, a Northern Ireland-wide 'Critical Care Network' operates to ensure best practice and support between all of the critical

care units. In addition all of the Royal Colleges (Surgeons, Physicians etc.) have published guidance for their members and these provided the detail to frontline clinicians.

Norway

The guidelines were realized in the beginning of the pandemic, based on experiences in other countries as China and Italy.

Switzerland

Owing to the rapid spread of the coronavirus (SARS-CoV-2), an extraordinary situation has been declared, and acute hospitals were therefore be confronted with a massive influx of patients. Initially, this could be absorbed by the restriction of elective procedures, the transfer of patients to intermediate care units (IMCUs), an increase in ventilator-equipped beds, and the avoidance of personnel-intensive treatment options. However, if insufficient resources were available, rationing decisions were necessary, placing considerable burdens on medical staff. Uniform criteria for intensive-care unit (ICU) admission and continued occupancy should be applied throughout Switzerland. The guidelines provided the necessary basis but had to be adapted by the issuing authority each time if experience in practice and new scientific findings so require. The latest version is available at: www.sams.ch/en/coronavirus.

The main challenges for hospital managers during the COVID-19 crisis

France

The biggest challenges were:

- To anticipate each stage of the crisis to always be one step ahead.
- To build a decision-making flowchart that is participative, responsive, that allows you to see all aspects of the subjects and which helps coordinate the actions of all the key persons and institutions.
- To organize the care of patients (Covid19 and noCovid19) with the others hospitals (public, profit private and non-profit private) of its territory. No hospital can alone manage the problem.
- To reorganize care in the hospital. To close or decrease a lot of medical units to find professionals for Covid19 unit. To teach in emergency to some of them to work in intensive cares.
- To build a good supply chain. One of the key issue is to have enough individual protection for the health workers, and to give send the good tools to work: respirators, curare drugs, laboratory tests…
- Especially during the first weeks to have a good communication so the health professionals have confidence in the management. This requires answering questions, being transparent, sending regular information, showing that the management has a clear strategy.
- To have clear orders and good discipline to avoid inappropriate individual initiatives.

Austria

There are many. This was a very unclear situation and uncertainty. Everyone, including hospital managers depended on the guidelines set by the government and other institutions. For example, restructuring and implementation of restrictions, which are set by the government, hygiene measurements, communication to authorities, distribution of beds to patients, allocation of resources and staff. It was very difficult to continue with the day-to-day activities in the

COVID-19

hospitals with current conditions. Specifically, wearing masks and distancing in the hospitals was a massive challenge for everyone involved (staff and patients).

Germany

Several main challenges for hospital managers were to secure the necessary capacities in terms of educated staff, material and accommodation. Available personal can be limited due to sickness or burnout. Furthermore, missing child-care due to closed kindergarten and schools can affect the already tense situation. Supply shortfall in terms of disinfectant, protective clothing or Corona-test equipment was also a big issue. How well hospitals are equipped with material varies considerably and depends among other factors on their individual storage capacity.

In the case of premises, possibilities for isolating patients and creating a clear separation from other areas must be created. The German hospital company provided a concept for verification of good cooperation between COVID-19 on-call duty and standard care in the hospitals. With the help of these regulations, the federal states should obtain the possibility for a gradual return to a standard care.

Greece: In these unprecedented and irregular times, hospital managers were on alert and had to be able of finding solutions for the organization's regular operation.

The level of uncertainty was high and managers should provide:

* clear and effective communication with all staff and amongst healthcare teams
* infection prevention and control training for the health care facility staff,
* recommendations for the rational use of personal protective equipment (PPE),

* training to all frontline workers on essential psychosocial care principles, psychological first aid and how to make referrals when needed,
* COVID-19 proper treatment and isolation/ quarantine sites,
* psychosocial support to health workers during quarantine or duration of illness if a health worker becomes a confirmed COVID-19 case,
* responsive communication with citizens

.

Moreover, cooperation and coordination with national and regional epidemiological and infectious diseases centers were fundamental.

Hungary

Hospital managers faced particular challenges. The government assigned a military hospital commander to each hospital to help provide the necessary supplies for care.

The release of hospital capacity required many professional decisions to be resolved. A key task was to provide the technical and human conditions necessary for the increased intensive capacities.

However, the professional and existential security of managers was not strong enough.

Iceland: The main challenges revolved around the uncertainties inherent in pandemics. As the traditional hospital system must be changed dramatically and quickly it was crucial to make decisions very fast and change them or abandon just as quickly. The plan had to be made on the go, following the development of the pandemic, using forecasts and the experience of other countries to learn from and support the plan. The advice of experts was important and, in many cases, forms the basis of systemic changes. Procurement of necessary supplies was a challenge as usual supply lines dry up very quickly. It was important to empower staff to come up with new ways of doing things, using the creativity of well-educated and dedicated people. Maintaining a sense of solidarity, trust and hope was a challenge, asking people to do impossible things was a challenge and seeking to be one step ahead always is a challenge.

Luxembourg

- Maintain hospital capacity at an acceptable level.
- Empower all stakeholders at all levels.
- Work to ensure good national coordination.
- Data sheet with COVID indicators to be filled in every morning by hospital departments. The Minister received the information collected daily in the form of a «dashboard».
- A seizure of hospital and intensive care bed capacities was done twice a day, that is to say at 8 a.m. and 4 p.m.
- Manage the normal care / intensive care work flow to balance care between hospitals.

- Raise awareness of non-COVID patients who hesitate for fear of contamination to go to a hospital for treatment, otherwise non-COVID pathologies risk being neglected, with serious consequences for the health of these patients.
- Restart of consultations in medical offices from May 4, 2020, subject to compliance with rigorous protective measures.
- Manage a gradual deconfinement and a restart of scheduled activities, which was ultimately even more complicated than a shutdown.
- Determination of additional costs due to Covid-19.
- Creation of a Hospital Logistics Center (including central purchasing), which will take over the activity of the National Logistics Cell and develop it.

Northern Ireland (UK)

Uncertainty – although planning has been strong, the path of disease and the amount of spread had been uncertain – national (UK) and local (N. Ireland) modelling by a group of experts has been useful but this has changed as data has developed and understanding of the disease pathway and spread has improved. Worry about: staff absence through the need to isolate due to a health condition or a family member with a health condition or covid symptoms; concern about supply of PPE, some medical supplies due to global demand, oxygen. However the strength has been anticipation or early identification of potential challenges and swift action to avoid difficulties.

Norway

The most important challenge was to balance the capacity of the need of ICU beds to all other activity and to secure the sufficient capacity of treatment to patients with other diseases than COVID-19.

Switzerland: It was important to be present to keep calm and to make clear decisions. Hospital managers had to make sure that the crisis management team was broadly supported by all relevant bodies and specialist areas, in particular the Communications Department. Problems could be solved in only one day, for which it would have taken months before.

Other conclusions:

Austria

Everyone is scared of a second wave of covid-19 infections.

Greece

Firstly, a stronger health system will undoubtedly put Greece in a better position to manage a second wave of the pandemic, however as the roadmap for the next few months begins to take shape it is becoming clear we should anticipate a series of rolling lockdowns that national governments will have to manage according to their own healthcare capacity.

Secondly, the calculus of economic versus human cost is one that will continue to evolve. It is likely to become harder for governments to gain public trust and compliance as the economy worsens, especially if the negative effects are unevenly distributed as studies in other countries lead us to expect.

Last but not least, considering the tremendous efforts exerted by healthcare staff around the world, one can say that in times of pandemics, "humanity" is at the front line. In the forefront and a significant movement of citizens and companies proved that solidarity is, similarly, a never-ending Greek story.

Iceland

C19-Outpatients / Outreach Clinic: When the first positive C19 cases were identified, the infectious disease specialists started to call them daily to check on them and monitor their symptoms. This very quickly became a huge task and more people had to be recruited to perform this surveillance. Nurses and physicians in quarantine were recruited for a while but as the group grew bigger the need to see some of the patients, do bloodwork and other tests became apparent. The phone calls soon proved to be a very effective way of both spotting those at risk of developing a severe form of C19 as well as giving advice, reassuring, explaining thus helping people manage their symptoms at home and prescribing appropriate medications. An abandoned housing facility on the hospital premises was changed into a clinic where health care providers were able to receive and assess patients that were not doing well at home. Staff was recruited from areas that had shut down or greatly reduced their services to work in the clinic.

Some patients had to be admitted to hospital straight from the clinic while most were able to go home and continue to be monitored with daily phone calls. The clinic got a list of positive test results several times a day throughout and every individual in the country was on their call list except for those in hospital. To date we have had 104 admissions, thereof 27 who have needed ICU. This proved to be within our capacity, but it is very likely that in the absence of the C19 clinic, admissions would have been a lot more, probably stretching our capacity severely.

Luxembourg

- A reorganization of our health system is necessary. We must learn from the health crisis, which has highlighted the limits of our current resources.
- We need to strengthen the role of hospitals to enable them to face future health crises → for a public service able to respond to vital priorities.

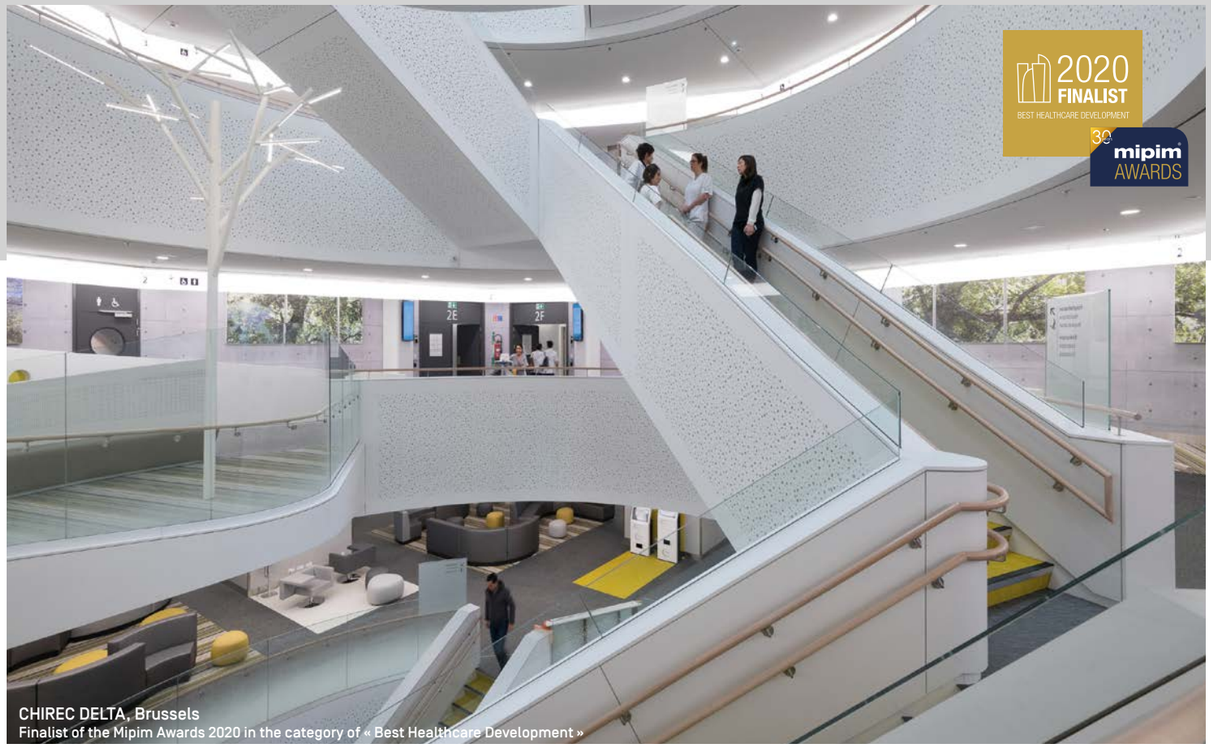
Northern Ireland (UK)

The experience has been important in identifying the interdependencies and the value of working together – between disciplines within the hospital setting; the dependency on the care home sector to ensure that hospital bed capacity is kept free for potential surge in admissions. The value of other partners including, for example, in Northern Ireland with a strong agricultural industry, the expertise of veterinary scientists in epidemiology, virology and the wider scientific community including the universities and the community at large – in changing their behaviours to avoid illness and protect scarce hospital resources.

Switzerland: Although of course no one had wanted this crisis to happen, it paradoxically is was almost exciting situation than it used to be. The employees were enormously motivated and the commitment was huge. The social distance was preached, but actually a moving together in the figurative sense happens. We don't have long discussions, we work together very quickly and without complications across all departmental boundaries, we pull ourselves together and adapt flexibly to situations. One is sociable with each other, they encourage each other. ■

ASSAR ARCHITECTS

www.assar.com



CHIREC DELTA, Brussels
Finalist of the Mipim Awards 2020 in the category of « Best Healthcare Development »

CHC - MONTLÉGIA CLINIC, Liège

AZ MARIA MIDDELARES, GHENT

HIS - IZZ, Brussels

Assar Architects is an architectural practice located in Brussels, Liège, Antwerp, Luxembourg and Paris.

It is configured around 21 partners, administering a team of nearly 145 staff.

Structured on the basis of multidisciplinary teams, it has a vast panel of expertise in all fields of architecture, planning, interior design, and landscape architecture, as well as in project scheduling, feasibility studies, the co-ordination of design studies, and safety co-ordination. Through the implementation of numerous emblematic projects for healthcare institutions, offices, housing, research centres and laboratories, public institutions, commercial logistics buildings, ASSAR has acquired an international reputation. This recognition has been rewarded many times by international awards.

In the field of healthcare, a very large number of references attest to the expertise of the teams both for a hospital context (hospitals and clinics) and for care for dependent individuals (gerontology, psychiatry, etc...).
In respect of diverse and complex programmes, projects are designed with our partners and the project owners. The responses provided are precise, cohesive, and innovative, while retaining the human element at the centre of our work. Responsiveness and collaboration ensure that the projects meet the requirements of all the stakeholders concerned.
Its mission is above all to provide its clients with a quality service and a very high level of technological content, which is translated into buildings that are elegant, ecological, harmonious, user-friendly, and whose maintenance is straightforward, and above all, durable structures. The pursuit of excellence is expressed in reliability, the complementarity of specialist teams, and the mastery of cutting edge technologies. These three characteristics constitute the DNA of the organisation.

Transforming the health sector

Some of Assar's most striking projects are undoubtedly those in the medical sector.

A particularly impressive project was the hôpital Chirec Delta in Brussels, whose construction began in 2010, and was completed at the end of 2017. This project was also nominated for the 2020 MIPIM Awards in the "Best Healthcare Development" category.
«Our main aim is to impart meaning to the human aspect for which we are building. This is crucial for this type of establishment. In fact it was designed not to look like a hospital». Despite its large capacity, it was conceived to be «very concentrated and compact», in order to confer upon the building a sense of familiarity for the patients, visitors and staff.

Between now and the end of March, Assar should also complete the construction of the MontLegia clinic in Liège. For this project, a medical «street» has been constructed to link the treatment units to the medical and technical departments, but also «to provide a clear separation of hospital circulation», explains Renaud Chevalier, CEO.
Renaud Chevalier refers to the importance of natural light – a key element in Assar's architectural design dossier. The renovation work currently in progress at the CHN hôpital William Lennox is located in the magnificent wooded setting of the Bois de Lauzelle, with large windows opening up to the sky.

The renovation of HG MONICA in Deurne is on-going, and this new project will be delivered in 2021.

And finally, Assar is pursuing the momentum of its healthcare design, having recently won the design and development of the new Clinique Saint-Pierre (75,000 m²) at a fine site in Wavre.






Mental health and illness in the public mirror

What pictures do the media draw and how do the people perceive them?

by Magdalena Rosset[1], Miriam Jaspersen[1], Anja Dittrich[1], Eva Baumann[1] & Paul Bomke[2]

[1] Department of Journalism and Communication Research, Hanover University of Music, Drama and Media
[2] Pfalzklinikum & "The Palatinate makes itself/you strong – Ways to Resilience"

By way of background, we know that worldwide, mental disorders are a tremendous social and economic burden (WHO, 2013). In Germany, every year approximately 18 million people are affected (Jacobi et al., 2014). Hence, there is an urgent need for strategies to prevent mental disorders. Since mental health is not only a relevant aspect for quality of life, satisfaction, better-coping abilities and well-being (Bengel & Lyssenko, 2012; Tugade, Fredrickson & Feldman Barrett, 2004) but as well an effective protective factor against mental disorders (WHO, 2004), one way to successfully prevent mental disorders is to promote mental health. Mental health promotion focuses on protective factors (salutogenetic perspective; Antonovsky, 1996) and aims to foster positive mental health by increasing psychological well-being. This refers to the importance of resilience meaning that people can maintain their mental health despite stress or to recover quickly from negative emotional experiences and to successfully cope with traumatic experiences (e. g., Chmitorz et al., 2018; Fergus & Zimmerman, 2005; Windle, 2011).

Media framing

Increasing awareness of mental health requires profound information and knowledge. Mass media provide a particularly important source for information about mental health to the public (Borinstein, 1992). But any media portrayal "select[s] some aspects of a perceived reality and make[s] them more salient in a […] text" (Entman, 1993, p.52). This process of selecting and emphasising specific aspects of an issue always leads to a specific perspective. By focusing on "a particular problem definition, causal interpretation, moral evaluation and/or treatment recommendation" (Entman,1993, p.52), journalists create frames that people use and thereby construct reality. The public, meanwhile, recognises those frames, makes sense of them through their own preexisting models and personal experience and uses them to understand the world they live in (e.g., Entman, Matthes & Pellicano, 2009; Gamson, 1995). Thus, the media play a significant role concerning how people perceive mental disorders and persons affected and on what they think and know about mental health and resilience (Dorfman, Wallack & Woodruff, 2005; Gamson, 1995). This framing effect particularly occurs if people neither have their own direct experiences with mental health issues nor are in touch with people suffering from a mental disorder.

As part of the process by which individuals construct meaning, "changes in the media discourse [can also] cause changes in public opinion" (Gamson & Modigliani, 1989, p.2). As a consequence, to influence meaning and drive change, those who aim to establish a certain perspective in the public – i.e., to set a frame – must communicate for the media (i.e., to get journalists' attention) and for content (tell the story from the perspective of the advocate) (Wallack & Dorfman, 1996). Hence, public health promotion efforts should take into consideration how the 'public's communication environment' is shaped, particularly by the media.

Mental health and the media

But in many cases, the way the media frame health issues conflicts with health promotion and preventive goals. Regarding mental health, it must be assumed that the way the mass media frame mental health and disorders is predominantly negative while protective factors – positive, salutogenetic (health- and prevention- oriented) aspects – are not an issue in the media at all. Instead, the mass media cover the issue from a pathogenetic, risk- and problem-oriented perspective emphasising the dangerousness and peculiarities of people affected and often report in the context of violence and crime (Aragones et al., 2014; Cover-

dale, Nairn & Claasen, 2002; Klin & Lemish, 2008; McGinty et al., 2014; Slopen et al., 2007). This suggests social distance from the outgroup, i.e. people with mental disorders who are often being held individually responsible for being affected while neglecting social and structural factors (Aragones et al., 2014; Zhang et al., 2016). Further, media coverage of mental disorders is estimated to convey inaccuracies, exaggerations, or misinformation which perpetuates misconceptions and stigma instead of emphasising the importance of social coherence and increasing resilience- and prevention-oriented beliefs (Aragones et al., 2014; Coverdale, Nairn & Claasen, 2002; Goulden et al., 2011; Henson et al., 2009; Klin & Lemish, 2008).

To successfully develop health promotion efforts and a media advocacy strategy addressing journalists as gatekeepers requires not only knowing the existing media frames. Also understanding how members of different target groups perceive the media environment (Wallack & Dorfman, 1996). Therefore, we investigated how German newspapers cover mental illness, mental health and resilience and how health experts and members of the public perceive the media coverage. We further aimed to figure out if the way the media frame mental health-related issues matches the recipients' perceptions. Here, we focus on both, health experts and professionals as well as the general public. The project is part of the "Ways to Resilience Initiative" of the Pfalzklinikum in the Palatinate region in Germany (Bomke, Kendall-Taylor & Cawthorpe, 2014; Bomke, 2015).

Methods

We conducted a quantitative content analysis and interviews with health professionals and members of the public. The content analysis covers the complete coverage on mental

health, mental disorders and resilience in the year 2018 in three German daily print newspapers: a regional (Die Rheinpfalz), a national (Frankfurter Allgemeine Zeitung) and a tabloid newspaper (BILD), each with the highest outreach in the Palatinate region. The relevant articles were identified by a full-text database search using significant keywords for mental health, mental disorders and resilience. Among those, articles covering the issue as the main subject were extracted. Overall, 546 articles were coded (Die Rheinpfalz: n = 268, 49%; Frankfurter Allgemeine Zeitung:

n = 171, 31%; BILD: n = 107, 20%) by three

coders who were trained before and reached a satisfying intercoder agreement (percent agreement = .90).

Additionally, qualitative semi-structured interviews with 16 health professionals and providers via telephone and 44 face-to- face interviews with members of the public aged between 18 and 71 were conducted. They were all recruited in the Palatinate region. Health professionals and providers worked in the fields of health prevention and provision, health promotion, education, social welfare and in working environments in the Palatinate region. Members from the public were recruited from different social contexts (rural vs. urban areas, economically underdeveloped vs. economically strong regions) and with different references to the issue (healthy versus directly affected from mental disorders vs. indirectly affected from mental disorders). The interviews focused (among other things) on the interviewees' perceptions of media coverage of mental health and mental disorders. Each interview lasted about 45 to 60 minutes and was recorded and transcribed literally. The transcripts were analysed using computer-assisted qualitative content analysis (Mayring, 2000), combining inductive and deductive strategies of coding.

Results

In the following, we contrast the results of the content analysis with the results of the interviews conducted with members of the public and health professionals and providers.

Scope of media coverage

Results of the quantitative content analysis reveal that out of 546 overall articles in the sample, 453 (83%) cover solely mental disor-

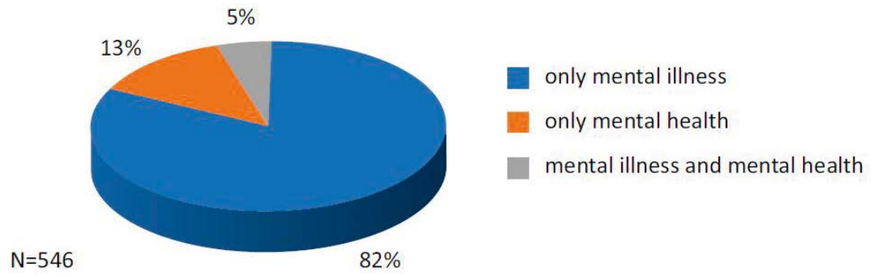


Figure 1: Focus of media coverage

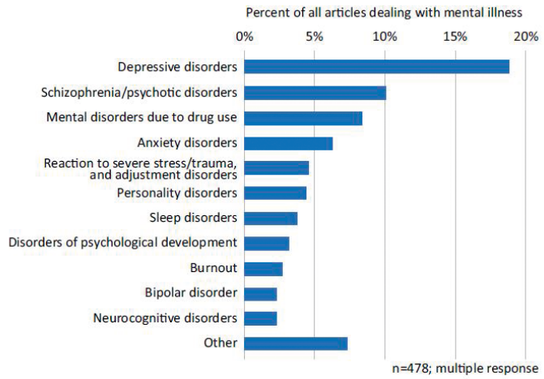


Figure 3: Mentioned mental disorders in all articles dealing with mental illness

ders, while only 68 articles (13%) focus exclusively on mental health (figure 1). 25 articles (5%) report on mental disorders as well as on mental health. 59 articles mention resilience either directly or indirectly (11% of all articles, 63% of all 93 articles covering mental health). But in all articles that deal with mental health, only 20% (n = 12) cover prevention. Members of the public only perceive few media coverage overall: "...mental illness is rather suppressed in the media."1 (Palatinate public, male, aged 32)

Content of media coverage

Even though members of the public only perceive some media coverage, they seem to have firm evaluations about how the media cover the issue. They've noticed an emphasis on burnout and celebrity suicides and a focus on crime: "...the media once again report on someone escaping from a mental institution, who is highly aggressive and violent..." (Palatinate public, male, aged 22)

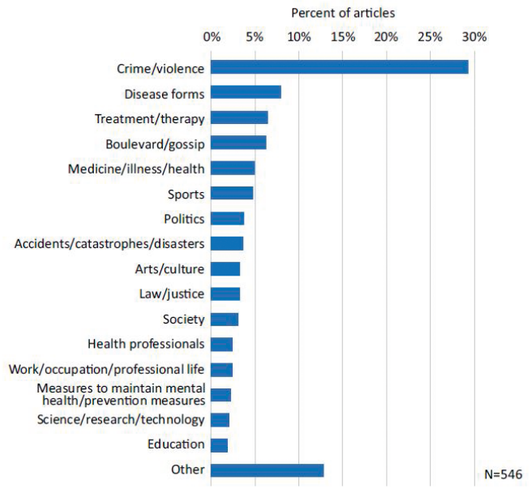


Figure 2: Main topics of media coverage

These perceptions are partly supported by the results of the content analysis: The articles deal mostly with crime and violence as a main topic (n = 160; 29%), far behind followed by types of the disease (n = 43; 8%), treatment options (n = 35; 6%) and boulevard/gossip issues (n = 34; 6%) as main topics (figure 2). This focus on crime also becomes apparent in that 190 articles (40% of all 478 articles covering mental illness) report on people affected by mental disorders as perpetrators.

Prominent people are discussed in 118 articles (22%). Only twelve articles (2%) treat measures to maintain the own mental health and preventive measures as the main topic and mental health and wellbeing are covered as the main topic by only seven articles (1%). The main topics covered are also reflected in the dominant occasions of reporting: 94 articles (17%) are written on the occasion of a crime or an act of violence, followed by 76 articles (14%) initiated by a lawsuit or judgment and 44 articles (8%) triggered by studies or empirical findings. Only 18 articles (3%) can be traced back to laypersons-oriented health or prevention programmes (e. g. information events, workshops).

However, the public's perception of a focus on burnout is not supported by the results of the content analysis: In articles dealingwith mental illness, the most dominant disorders by far are depressive disorders2 (n = 90; 19% of all 478 articles covering mental illness), followed by schizophrenia (n = 48; 10% of all articles covering mental illness) and disorders related to drug use (n = 40; 8% of all articles covering mental illness; figure 3). Meanwhile, burnout is only mentioned in 13 articles (3% of all articles covering mental illness).

Attributions of responsibility

Results of the semi-structured interviews with health professionals and providers 2 We deliberately asked for burnout separately from depression, since it is usually not perceived as a form of depression in the public discourse. and members of the public reveal that their perceptions of the media depiction correspond to the dominantly negative media stereotyping found in previous studies with mental health and disorders predominantly being treated as issues of individual responsibility: "...such portrayal is dominating the media, that it is in the responsibility of every single one of us, how mentally healthy we are." (Health professional/provider, female, aged 42) Contrary to these perceptions, most articles covering mental illness (n = 412; 86% of all articles covering mental illness) or mental health (n = 69; 74% of all articles covering mental health) don't include any responsibility attribution (figure 4). Only 3% of all articles covering mental illness (n = 15) and 13% of all articles covering mental health (n = 13) treat mental illness or mental health as issues of individual responsibility, while 8% of all articles covering mental illness (n = 39) and 11% of all articles covering mental health (n = 10) attribute responsibility on a collective level and 3% of all articles covering mental illness (n = 12) and 2% of all articles covering mental health (n = 2) deal with mental disorders and mental health as issues of individual as well as collective responsibility.

Suggestions on the lack of scope and quality of coverage

As potential reasons for the lack of media coverage on mental health and a stereotyped way of portraying, one health professional identifies journalists' lack of knowledge about the issue, journalistic routines and the importance of news factors: "Lack of better knowledge, that's the main point. And the second aspect is: What is interesting? I guess it is more interesting to portray things black-andwhite instead of showing complexity..." (Health professional/provider, male) Corresponding to existing research results, one health profes-

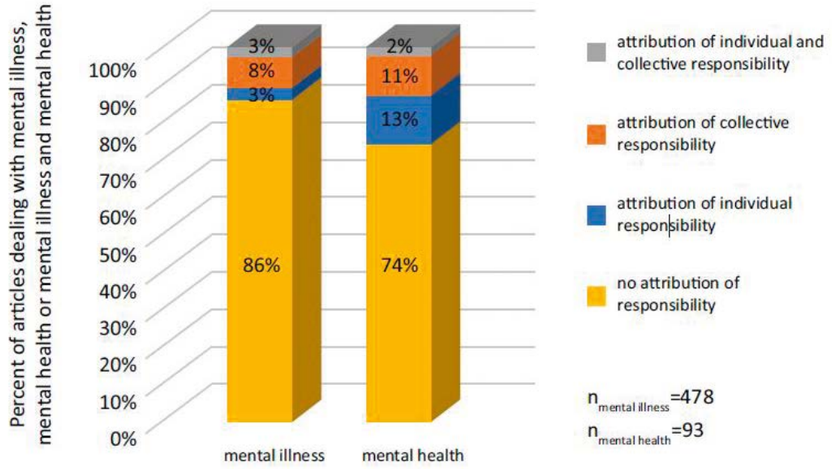


Figure 4: Responsibility attribution for mental health and illness in the media coverage

sional notes that the depiction of mental disorders often isn't accurate and differentiated, e.g. the media misrepresent the reality about psychiatric clinics: "My impression is that psychiatric hospitals are portrayed in a false and biased way in movies and other media. This has nothing to do with real-life in these clinics. Watching such movies and seeing people in straightjackets sitting on the floor with a look of vacuity may frame what people think about these clinics." (Health professional/provider, female, aged 29)

Suggestions on the impact of media coverage about mental disorders

Respondents suggest strong effects of the media coverage of mental disorders on society, as well as on people affected and their relatives: "If a person affected by mental disorders (…) hears something like this, it can have a very negative impact – even suicide." (Palatinate public, female, aged 20) "I think distorted portrayals can lead to fear. In the end, people may think that if someone has schizophrenia, he will automatically be aggressive or that mentally ill people always have a sexual preference disorder." (Health professional/provider, female, aged 29) They criticise potentially stigmatising effects of inaccurate, negative and stereotyped media portrayals of mental disorders and people affected that could increase selfstigma by making them feel ashamed which may result in delayed help-seeking: "Movies often show very extreme cases no one wants to get in touch with. This can make people think that their own situation is not that bad. Or they just don't want to belong to that group. This makes them avoid dealing with the disorders, seeking help or talking about it." (Health professional/provider, female, aged 29) Suggestions to improve media portrayals Both health professionals and members of the public claim for positive examples and success stories of people affected by mental disorders in the media: "The media should show more positive stories." (Palatinate public, male, aged 71). They further demand more background information: "...just more explaining to increase understanding." (Palatinate public, female, aged 24). Media portrayals should further be case-oriented: "... it only works with best practice cases, with concrete projects and locally achieved results. (…) Making things more tangible. Thus, doing good and talking about it, for me, that is the key." (Health professional/ provider, male, aged 59)

Discussion

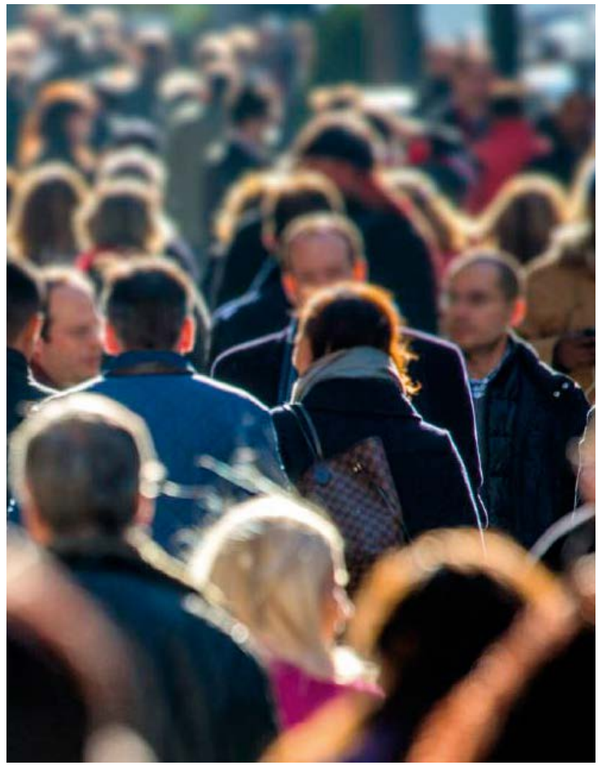
Our results show that the audience's perceptions of media coverage of mental health and mental disorders match existing evidence from previous media analyses: The media environment is perceived as being rather stigmatising and sensationalising, covering mental disorders as an issue of individual responsibility, thereby neglecting social and structural responsibilities. However, our own content analysis can only partly support the audience's perceptions and past results.

While data from our study confirm that media coverage focuses on mental illness with an emphasis on crime and violence, while rather neglecting mental health, resilience and prevention, contrary to previous studies, we didn't find a focus on individual responsibility – as in most cases, no responsibility was attributed at all.

Nevertheless – to successfully foster the promotion of mental health in the society – the results clearly underline the need for a frameshift from the prevalent risk-, deficitand

problem-oriented perspective to a health- and capacity-oriented perspective. To support the achievement of this goal and use the media as a powerful driving force of social change, some recommendations to the media can be derived from our study: it seems promising to involve audiences by using narratives, especially of recovery and success stories.

Moreover, the quality of the coverage should be improved by providing more accurate, differentiated, balanced and authentic portrayals. Such positive media portrayals may be able to improve public understanding —not only regarding mental disorders and treatment options but also concerning resilience, prevention and protection. To sum up: knowledge about existing media frames and dominant frames in the public can and should be used to guide the development of a media advocacy strategy addressing journalists as gatekeepers (Wallack & Dorfman, 1996). To shift this thinking, it is also relevant to use a public health approach for professionals, users and policy decisionmakers. The future challenges around mental health can only be solved, if societies will focus on community-based strategies in promoting mental health, working together with civic-engaged groups and connecting service providers with the local municipalities (Bomke, 2016; Bhugra et al., 2017).



Towards an automation of your hospital logistics flows

Nowadays, DS AUTOMOTION is one of the world leaders in the development and construction of automated transport systems using Automated Guided Vehicles (AGV). One of the field that particularly interests us, and where DS AUTOMOTION specializes, is automatic transport in hospitals.
"We developed this branch on this sector fifteen years ago in Austria, where our headquarter is located, and in France. The huge number of logistics flows in a hospital increases the complexity of organizing automatic transport. Moreover, installations have a significant span. Over time, we have acquired a considerable experience on the French speaking market (Belgium, France, Quebec, with prospects in the Grand Duchy of Luxembourg and in Switzerland), which has strengthened our expertise in automatic transport in hospitals", explains Franck Scotto, Director of AUTOMOTION SARL.

PAYING ATTENTION TO HOSPITAL'S NEEDS

The first requirement for successful hospital logistics automation is to be accommodate to the needs of the hospital. In this sector, there aren't standard products, each hospital has his own organization, and therefore specific requests.
"Our characteristic is that we are especially attentive to the needs of our customers in order to offer them the most suitable solution. This requires being extremely competent, having internal people who are able to understand what the customer wants. Thus, our biggest work is the study of the preliminary project which consists of understanding, apprehending, guiding, and especially advising hospitals. Finally - and this is a little bit paradox - our engineers understand as well as the client himself how container's flows work at the concerned hospital. To achieve this, various skills must apply together. But it really sets us apart from other companies on the market in this domain."

IN PARTNERSHIP

When a hospital center wants to automate its logistic flow, it had often heard about it, saw on photos/videos how robots work, or even visited another already automated site. However, the system's notion remains rather unclear. Informing is a role that DS AUTOMOTION also takes on: "We are not here to offer only a great tool but also to give advises. We will suggest the right tool and mostly how to use this beautiful tool."

The proposed solution which is the more adapted to needs will be the result of continuous consultation, based on a lot of discussions with the hospital and reflections, on a way of partnership and dynamics, both in discussions and in construction.
In the light of the lifespan of an AGV installation (15 to 20 years) the partnership is spread over long time. "That means that the hospital center is committed to the company which will automate its flows over 15 to 20 years. Our teams are totally integrated to some hospitals which are collaborate with us. For the reason that hospital constantly changes in its operation, the flexibility of our system is a significant advantage.".

NO MECHANICS WITHOUT COMPUTER SCIENCE

Efficient management of logistics flows requires navigation, control and steering systems. DS AUTOMOTION produces Automated Guided Vehicles (AGV), commonly known as AGV. This means that the way that AGV will travel is defined in advance, after that the AGV will execute its tasks completely independently. For example, carrying containers of laundry from one room to another room in the building using a freight elevator. The different possibilities are introduced in the on-board computer on the AGV which will execute self-contained request. "AGV can be compared to driverless cars, except that in a hospital constraints are a little less complex than on road (we are in indoor environment). The operation principle remains the same: AGV recognizes the contours, bypasses them, and knows where the hoists are located ..."
Navigation is completely free and can be done by odometry, by laser or by contour recognition (SLAM). (Video examples on the site: www.ds-automotion.com)

THOROUGHNESS AND STRUCTURING

On a normal hospital site, all flows can be transported by AGV: meals, clean/dirty laundry, waste, pharmaceuticals, sterilized products, the store, etc.
"Compared to manual handling, a system like this is very structuring. The AGV will not stop by the way without being scheduled. The system is based on industrial principle oriented results. This means that there is a flow which has to be complete, for example transporting 50 meal carts from 9 a.m. to 10 a.m., and the system will react by executing the order carefully. Thoroughness and very structuring are the watchwords."
Another significant consequence is that hospital staff can devote more time to their primary task, which is to help and support patients, while taking less care of the essential logistics.
However, the system remains flexible, simple and user-friendly in its use. Thanks to touch screen, even on your tablet, inputs can be made, in order to generate new flows according to needs of the moment.
A central point in the robot journeys is safety. "Our vehicles, which meet strict standards, are all fitted with redundant safety devices, which means that as soon as there are obstacles, people approaching, the AGV slows down and stops."

REFLECTION FOR THE FUTURE

"We are in process of developing this type of logistics solution for sterilization centers with the aim of bringing sterile products to operating rooms on a just-in-time basis. It's a principle strongly developed in the industry (automobile for example) to minimize stocks. Reducing stocks is a trend that is also found among hospital architects in order to increase useful spaces. The stock is on our AGVs and supplies the receiver in just in time. Our thinking is really industrial, surely a little bit staggered, but despite everything to bring advantages to hospital solutions."

DS AUTOMOTION

info.france@ds-automotion.com

Limitations and future perspectives

The results must be interpreted under consideration of some limitations: The results regarding the audience's perception is based on data from qualitative interviews. Therefore, they aren't representative, but they still allow an exploration of the existing thinking patterns in society. Even though the respondents of our interviews were from the Palatinate region and the sample for the content analysis consisted of newspapers with the highest outreach in the Palatinate, we cannot test nor assume direct effects of the articles under analysis. The empirical studies described here are parts of a research programme, in which we develop a theoretically and empirically based framework as a basis of a reframing strategy in the field of mental health promotion (Baumann & Bomke, 2018; Bomke, Baumann & Schwepe, 2016). The aim is to reframe mental health from a pathogenetic (disease- and treatmentrelated) to a salutogenetic (health- and prevention-oriented) approach, that has the power to motivate and engage members of society from different settings and social contexts as advocates to develop new, more productive attitudes and beliefs that have the potential to change culture and policy and improve mental health and social outcomes. Our empirically driven strategic communications process integrates different perspectives. Here, we presented results from the perspectives of health professionals and providers as well as the public and the media, in further research steps, we integrate the perspective of researchers and experts in the field of mental health, mental disorders and resilience as well as relevant organisations in the field. ■

References

Antonovsky, A. (1996). The salutogenic model as a theory to guide health promotion. Health Promotion International, 11(1), 11–18.
Aragonès, E., López-Muntaner, J., Ceruelo, S., & Basora, J. (2014). Reinforcing stigmatization: Coverage of mental illness in Spanish newspapers. Journal of health communication, 19(11), 1248-1258.
Bengel, J., & Lyssenko, L. (2012). Resilienz und psychologische Schutzfaktoren im Erwachsenenalter. Stand der Forschung zu psychologischen Schutzfaktoren von Gesundheit im Erwachsenenalter. Köln: Bundeszentrale für gesundheitliche Aufklärung (BZgA).
Bhugra, D. et. al. (2017). The WPA-Lancet Psychiatry Commission on the Future of Psychiatry. Lancet Psychiatry, 4(10), 775-818.
Bomke, P. (2015). A focus on prevention, in Pan European Networks, Science & Technology, 17. Retrieved from http://www.resilienzpfalz.de/fileadmin/resilienz/uploads/media/2015-12_Paneuropean_Networks_Science_and_Technology_Bomke_A_Focus_on_Prevention.pdf (Accessed: 06.10.2019).
Bomke, P. (2016). Mental health: A communication challenge. Retrieved from https://www.openaccessgovernment.org/mental-healthcommunication-challenge/27007/
Bomke, P., Kendall-Taylor, N., & Cawthorpe, D. (2014). Building a Road to Resilience. Retrieved from www.adjacentgovernment.co.uk/special-reports/buildingroad-resilience.
Bomke, P., Baumann, E., & Schwepe, M. (2016). Mental health: A communication challenge. Pfalzklinikum and the Hanover Center for Health Communication outline why mental health requires a social change. Adjacent Government, S. 60-61. Retrieved from http://www.resilienzpfalz.de/fileadmin/resilienz/uploads/media/2016-05_Bomke_Baumann_Schwepe_Mental_health_new_communication_approach.pdf
Borinstein, A. B. (1992). Public Attitudes Toward Persons with Mental Illness. Health Affairs, 11(3), 186-196.
Chmitorz, A., Kunzler, A., Helmreich, I., Tüscher, O., Kalisch, R., Kubiak, T., Wessa, M., & Lieb, K. (2018). Intervention studies to foster resilience - A systematic review and proposal for a resilience framework in future intervention studies. ClinicalPsychology Review, 59, 78-100. DOI: 10.1016/j.cpr.2017.11.002.
Coverdale, J., Nairn, R., & Claasen, D. (2002). Depictions of mental illness in print media. A prospective national sample. Australian and New Zealand Journal of Psychiatry, 36, 697-700.
Dorfman, L., Wallack, L., & Woodruff, K. (2005). More than a message: Framing public health advocacy to change corporate practices. Health Education & Behavior, 32(3), 320-336.
Entman, R. M. (1993). Framing: Toward clarification of afractured paradigm. Journal of Communication, 43(4), 51-58.
Entman, R. M., Matthes, J., & Pellicano, L. (2009). Nature, sources, and effects of news framing. In K. Wahl-Jorgensen, &T. Hanitzsch (Eds.), The handbook of journalism studies (pp.175-190). New York, NY: Routledge.
Fergus, S., & Zimmerman, M. A. (2005). Adolescent Resilience: A Framework for Understanding Healthy Development in the Face of Risk. Annual Review of Public Health, 26, 399-419. https://doi.org/10.1146/annurev.publhealth.26.021304.144357
Gamson, W. A. (1995). Constructing social protest. In H. Johnston, & B. Klandermans (Eds.), Social movements and

culture 4 (pp. 85-106). Minneapolis, MN: University ofMinnesota Press.
Gamson, W. A., & Modigliani, A. (1989). Media discourse and public opinion on nuclear power: A constructionist approach. American Journal of Sociology, 95(1), 1-37.
Goulden, R., Corker, E., Evans-Lacko, S., Rose, D., Thornicroft, G., & Henderson, C. (2011). Newspaper coverage of mental illness in the UK, 1992-2008. BMC Public Health, 11, 796.
Henson, C., Chapman, S., McLeod, L., Johnson, N., McGeechan, K., & Hickie, I. (2009). More us than them: Positive depictions of mental illness on Australian television news. Australian and New Zealand Journal of Psychiatry, 43, 554-560.
Jacobi, F., Höfler, M., Strehle, J., Mack, S., Gerschler, A., Scholl, L., Busch, M. A., Maske, U., Hapke, U., Gaebel, W., Maier, W.,Wagner, M., Zielasek, J., & Wittchen, H. U. (2014). PsychischeStörungen in der Allge meinbevölkerung. Studie zur Gesundheit Erwachsener in Deutschland und ihr Zusatzmodul „Psychische Gesundheit" (DEGS1 MH). Nerven arzt, 85, 77-87.
Klin, A., & Lemish, D. (2008). Mental disorders stigma in the media: Review of studies on production, content, and influences. Journal of Health Communication, 13(5), 434-449.
Mayring, P. (2000). Qualitative Inhaltsanalyse. Grundlagen und Techniken (7. Auflage). Weinheim: Deutscher Studien Verlag.
McGinty, E. E., Webster, D. W., Jarlenski, M., & Barry, C. L. (2014). News Media Framing of Serious Mental Illness and Gun Violence in the United States, 1997-2012. American Journal of Public Health, 104(3), 406-413.
Slopen, N. B., Watson, A. C., Gracia, G., & Corrigan, P. W. (2007). Age analysis of newspaper coverage of mental illness. Journal of Health Communication, 12(1), 3-15.
Tugade, M. M., Fredrickson, B. L., & Feldman Barrett, L. (2004). Psychological Resilience and Positive Emotional Granularity: Examining the Benefits of Positive Emotions on Coping and Health. Journal of personality, 72(6), 1161-1190.
Wallack, L., & Dorfman, L. (1996). Media advocacy: A strategy for advancing policy and promoting health. Health Education Quarterly, 23(3), 293-317.
Windle, G. (2011). What is resilience? A review and conceptanalysis. Reviews in Clinical Gerontology, 21, 152–169. https://doi.org/10.1017/S0959259810000420
World Health Organization (2004). Promoting Mental Health. Concepts, emerging Evidence, practice: Summary Report. Geneva: World Health Organization.
World Health Organization (2013). Investing in mental health: Evidence for action. Geneva: World Health Organization.
Zhang, Y., Jin, Y., Stewart, S., & Porter, J. (2016). Framingresponsibility for depression: How U.S. news media attributecausal and problem-solving responsibilities when covering amajor public health problem, Journal of Applied Communication Research, 44(2), 118-135.

EAHM Congress Ghent

Final report

September 11th to 13th 2019

The Belgian Association of Hospital Managers (ABDH-BVZD) has organised the 28th Congress of the European Association of Hospital Managers (EAHM) in Ghent on September 11-13th 2019.

The conference theme was "Innovative Healthcare Strategies".

With innovation and transformation at the forefront of the agenda of all healthcare stakeholders, the ABDH-BVZD has completely reviewed and redesigned the congress concept.

An exciting and inspirational setting to meet, learn and share knowledge, experience and expertise on the transition to digital healthcare, having robust strategies, infrastructure and facilities in place to continue to offer high quality and safe care in

the industry 4.0 era in a sustainable way.

The congress has connected today's and tomorrow's leaders to shape the future of healthcare.

The targeted audience was to invite our European colleagues:

- hospitals: C-suite, clinicians and managers
- health industry professionals and innovators: industry, pharma, startups and entrepreneurs
- healthcare authorities: ministries, governments and policy makers

So we have welcomed over 25 national associations and healthcare leaders from around Europe and beyond.

Around 550 participants from 31 different nations, primarily European colleagues but also guests from Singapore, Russia, the Middle East, the Maghreb states and Israel have given the congress an international framework.

All these guests have joined this international multidisciplinary forum to exchange knowledge and best practices and experience the key values of our association and this conference: leadership, excellence, open-mind and friendship.

Preparation-Organization

At the end of 2015, the Board of ABDH-BVZD, acting on a proposal from the Executive Committee, decided to submit the candidature to the EAHM for the organization of the 2019 Congress.

The "Bureau" of ABDH-BVZD was elected as Congress Board, with the following functions:

- Danny Havenith, Congress Chairman
- Prof. Pascal Verdonck, member of EAHM scientific committee
- Paul D'Otreppe, chairman of ABDH-BVZD
- Freddy Iemants, Belgian Delegation on Board EAHM
- Wim Allemeersch, secretary-general ABDH-BVZD
- Christophe Mouton, replaced by Dr. med. Gilbert Bejjani in 2017

First talks took place with the then president and vice-president of EAHM Gerry O'Dwyer and Marc Hastert. The innovative innovative concept of the decentralized organization of the congress

- On the one hand, in the Meet & Greet of the Ghelamco Arena in Ghent, in direct proximity to spin-off companies and high-tech industry
- and, on the other hand, visiting six new-build hospitals around Ghent.

In the six hospitals, the topic was deepened in small groups with specific subjects. In the run-up to the congress, when enrolling, the participants had to opt for two subgroups besides the plenary sessions in Ghent.

The fact of having created small groups of ± 80 to 100 people was the key to the success of the congress. Instead of sitting side by side in a large auditorium without contact, the decentralized concept ensured movement and communication among the participants. Interested CEOs from various countries travelled in small groups and were able to develop their network in addition to the content.

In this context, the ABDH-BVZD, as host organization, reached an agreement with the EAHM that was outside the classical framework. Thus, the foundation of the EAHM 2019 Congress was laid: an innovative concept, an innovative topic and a sound financial framework.

Immediately, the Organizational Committee has made the construction of a specification so that event and congress management could be described. Three companies submitted their candidature and offer. On the basis of

the objective criteria, the board of the ABDH-BVZD decided in 2016, also three years before the congress, for the company BEVAS also Lochchristi. Simultaneously with this decision, the choice fell on Ghent as hosting town.

Together with BEVAS (Patrick Vermaerke and Jeroen Vandervelde) there was a close cooperation, many meetings, all of which were very organized.

Very quickly, a logo for the congress was created, created an internet address www.eahm2019.eu and created email contacts.

In 2019, BEVAS was then supported by SEMICO, Ms Lieve Ectors, in the field of congress management (data management, registration, scientific program organization).

On the part of the ABDH-BVZD a tremendous honorary activity of the members of the executive committee was accomplished.

The EAHM2019 Congress was prepared as part of a project management. The following subareas were determined with a timing and milestones:

- Scientific Program
- Innovation Award
- Finance - partnership with industry
- Communication - database
- Registration information

Wednesday, September 11th 2019 - Pre-kick-off tour

In order to give international and national guests the opportunity to get to know the Belgian health system, we have offered groups and individuals the opportunity to participate in the pre-kick-off tour. Two activities could be enrolled: on the one hand the UZ Gent and the Orsi Center, on the other hand the Psychiatric Forensic Center.

With the aim of making the speakers known to each other (chaiman sessions, speakers), we invited all chairmakers on wednesday evening, speakers and hospital directors to a meeting.

Thursday, September 12th 2019 – Official Inauguration

Throughout the congress, Meet & Greet partners has invited the participants to networking moments on their stands (from Wednesday afternoon to Friday afternoon.)

Speakers at the official opening session were:

Official welcoming by Mr. Danny Havenith, congress chair

Welcoming speech by Prof. Dr. Eric Mortier, CEO Ghent University Hospital

Keynote speech by Dr. Paul Stoffels, Vice Chairman & Chief Scientific Officer – Johnson & Johnson

Keynote speech by Prof. Dr. Eugene Fidelis Soh, CEO TTSH and Central Health, Chairman CHI Co-Learning Network Transformative shifts in Healthcare.SG

Welcoming by Mr. Pedro Facon, Director of Belgian Ministry of Health

Official inauguration congress by Mr. Philippe Blua, president of the EAHM

Thursday & Friday, September 12th and 13th 2019

6 THEMES, 6 HOSPITALS

TWO SESSIONS

AZ Groeninge Kortrijk THEME: BIG DATA & DIGITAL HEALTH

Measuring is knowing. A lot of data is available on this. But it is often to fragmented. What used to be kept on paper, is now systematically digitized so that every doctor, nurse but also those involved in primary care have access to the useful and necessary data from the patient file. How far are we going to share data? What is needed to better coordinate data? And how do we eventually get the right insights from that mountain of collected data?

AZ Groeninge, which has over a thousand beds (1054, to be precise), is located in the south of West Flanders, close to the French border, 30 km from Lille.

The institution strives to place the patient at the centre of the care process. The values which drive it are first and foremost respect and trust (via a participatory model), transparency, open communication, accessibility of care, listening, receptiveness and diversity.

Digital health and Big Data are two particular priority areas here. Indeed, since 2012, AZ Groeninge has been implementing an integrated computerized patient record right across the hospital. It seeks, via the data collected, to deliver greater patient safety and quality of care. As a supra-regional care centre, it hopes in this way to set the standard in terms of digital innovation.

Finally, in 2013, AZ Groeninge became the first Belgian non-university hospital to secure the International JCI (Joint Commission International) accreditation. This rating is awarded for three years, and the hospital was awarded a third accreditation in 2019.

Delta Chirec Brussels THEME: FINANCE & HEALTH ECONOMICS

New technologies cost money and require investment. On the other hand, these innovations make the healthcare provider's work easier and more efficient and investments in technology and prevention work in a cost-saving way in the long term. Is our health care still affordable? Is our reimbursement system still in order and to what financing model should we evolve?

The AZ Delta Chirec hospital group is based around three hospital sites: one site in Walloon Brabant, in Braine-l'Alleud – Waterloo (287 beds) and two sites in Brussels: Ste-Anne St-Remi in Anderlecht (327 beds), plus the brand-new Delta hospital (438 beds), which opened in December 2017.

Delta is the first new hospital to be built in the Brussels region for no less than forty years. So its opening was a major event. The new site has been designed to be hyper-functional for doctors and staff alike: flexible, with simple pathways and short distances, and planned to give both patients and staff the maximum comfort and light. Sitting at the leading edge of technology, Delta's facilities include 28 entirely digital operating theatres, which offer the possibility of monitoring surgical operations live from any conference room in the world.

However, CHIREC has also been careful to retain neighborhood bases, with two day hospital sites in Brussels (Cavell and Basilique) and three medical centers in Brussels (Parc Léopold, City Clinic CHIREC Louise, Europe-Lambermont) and one in Walloon Brabant (Jean Monnet).

The group provides treatment across all medical/surgical areas, except for heart surgery and interventional cardiology, but it owes its particular reputation to its ophthalmology, its Bariatric Surgery Centre, its musculoskeletal facility, its assisted fertilization center and the Chirec Cancer Institute. Its philosophy is to offer all its patients top-quality healthcare and personalized medicine in line with a coordinated multidisciplinary approach.

AZ Delta Roeselare THEME: SMART BUILDINGS & LOGISTICS

In recent years huge investments have been made in new hospitals in Belgium. Hospitals also need to become intelligent buildings that are managed intelligently and efficiently on the basis of data. How can the technology be used in such a way that the hospital of the future will continue to evolve and contribute to better connected and personalized care for the patient?

AZ Delta Roeselare, the biggest hospital in West Flanders, has 1417 beds, spread across 5 sites: three in Roeselare, one in Torhout and one in Menen. By the end of 2019, when the new phase of construction which is currently underway is scheduled to be finished, the institution will only have 4 sites, although the number of beds will still be the same.

The institution prides itself on being driven by values of friendliness, collegiality, positivity, respect and honesty. AZ Delta Roeselare is a hospital which strives to set a benchmark in terms of quality, caring for any patient entitled, and talking to the patient and everyone involved in care-giving, while constantly developing and improving.

AZ Delta Roeselare is particularly famed for orthopedics and rehabilitation on the one hand, and cardiology on the other.

In its new building, smart architecture and logistics are two aspects which the hospital has prioritized in particular, because it regards them as crucial in ensuring that the hospital will continue to be at the top of its game going forward.

UZA Antwerp THEME: HEALTH MANAGEMENT, GOVERNANCE & ETHICS

The digital revolution will change the relationship between the care provider and the patient in a positive way. What are the advantages of the digital revolution for hospitals and society? What is the role of the doctor and other medical staff in a hospital? Is precision medicine the ultimate model? Does every treatment have to be available and possible for every patient? How far must the involvement of the patient go? How can we accelerate that process in the interests of the patient? The importance of ethics will only increase.

Antwerp University Hospital (UZA), with its 573 authorised beds, lies in the south-west of the province of Antwerp.

It is an academic centre for leading clinical and customer-friendly patient care, high-quality academic education and ground-breaking scientific research with a major international dimension. It is one of Belgium's seven university hospitals.

UZA focuses on clinical scientific research, based on a large biobank. In clinical terms, the hospital enjoys wide renown for its treatment of oncological and haematological complaints and cardiovascular diseases, and its mother and baby unit, and both clinically and scientifically, the hospital is supported by a broad medical genetics platform.

The particular values driving UZA are a focus on results and cooperation, loyalty and integration, and a sense of responsibilities and reality, coupled with a constant striving for quality, as may be seen from the fact that it secured the American JCI (Joint Commission International) accreditation for the first time in 2015 and then again in July 2018. It is the first European hospital recognized as a Magnet Hospital, the highest standard in nursing care.

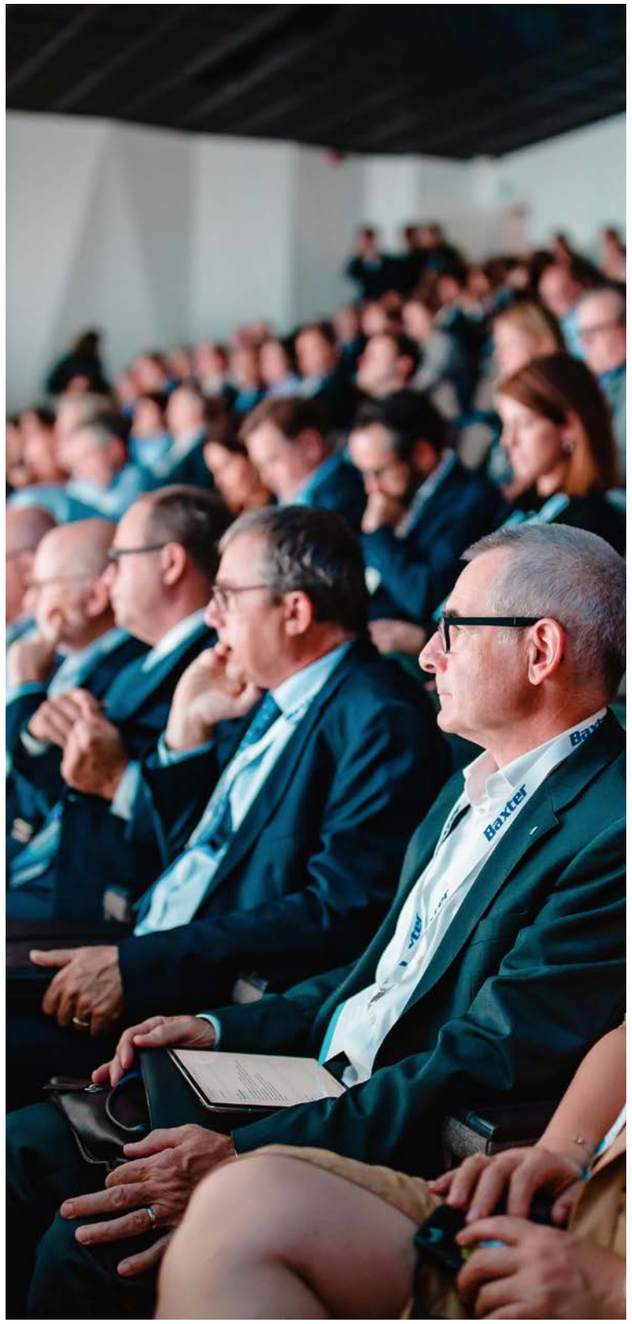
AZ Zeno Knokke THEME: HEALING ARCHITECTURE

Technology will have an even greater impact in the near future on the preventive, diagnostic and therapeutic possibilities of medicine and healthcare. Modern medicine is increasingly becoming 'evidence based'. The more and more genetic and clinical parameters become identifiable and measurable, the more we are confronted with an abundance of medical data. The only way to make progress is to innovate in health care. How you do that? What are tricks and pitfalls for a successful innovation strategy?

AZ Zeno is a medium-sized hospital with 334 authorised beds, spread across three sites, on the Belgian coast, including the brand-new site at Knokke-Heist, which opened in March 2018.

Under the slogan 'This is not a hospital', AZ Zeno is innovating, with its new construction marrying the highest technology with a unique architectural design and aiming to deliver the best level of comfort for patients and staff alike. It is very different from a traditional hospital in that it combines a green setting among the polders with a warm, optimistic interior, bolstering a feeling of well-being among the workers and helping patients to heal.

The values that drive it include a warm welcome, competence and innovation, all in support of the sole purpose of offering patient-based care.



AZ Zeno plans to offer high-quality care to the people living in the region, as well as tourists. The institution has recently been awarded the NIAZ-Qmentum quality label.

AZ Maria Middelares Ghent THEME: INNOVATION & TECHNOLOGY

No matter how healthy a person lives, everyone sometimes gets sick or has to be admitted to the hospital. With every intervention or treatment, the intention is to get the patient back to his comfortable home situation as quickly as possible. But even better is to work on preventive and predictive health care, from birth to the end of life. How do hospitals bring about this health continuum? And what does that ultimately yield to the patient?

The job of care providers is different in the hospital of the future. The medical staff will have to develop new skills to get started with the innovations. At the same time, there are many vacancies in health care, how will we implement them and will we also use our human capital in the future?

AZ Maria Middelares, located to the south of Ghent, in East Flanders, is easily accessible by both car and public transport. It is a medium-sized institution with 542 authorized beds and 99 beds for day patients.

AZ Maria Middelares is a very efficient hospital, innovative yet proud of its warm human face. Constantly monitoring advances in science, it offers high-tech healthcare alongside basic care.

The hospital's high-quality care is safeguarded by its profound appreciation of the personal investment of all its doctors and staff. Additionally, AZ Maria Middelares aims to broaden its horizon, breaking through the walls of its immediate environment. This is reflected not only in the constructive dialogue pursued with general practitioners, but also in the great va-

lue the hospital attaches to its collaboration agreements with its (international) partners.

The services and disciplines, which have forged the reputation of AZ Maria Middelares and continue to do so today, include cardiology and heart surgery, its Ophthalmology Centre, its integrated Cancer Centre, physiotherapy (with interactive programs and a spinal unit) and its Foot Centre, which is the biggest in Flanders.

Its constant striving for quality was rewarded in 2016 when it was accredited by the American JCI (Joint Commission International).

Thursday, September 12th 2019 – 8PM - 11 PM: Networking Gala dinner in the Opera

Friday, September 13th 2019 – 2:30PM - 4PM: Academic Session Meet & Greet Center

Chair: Prof. Dr. Ir. Pascal Verdonck

Chair of the Scientific Committee EAHM2019 congress

Keynote Speech 1:

Prof. Dr. Gregory Katz

Chair of Innovation & Value in Health, University of Paris Medical School, Director General, Consortium VBHC France

Valuing Health Outcomes: the Power of Transparancy

Keynote Speech 2:

Mr. Erik Van Den Eynden

CEO ING

What can a hospital manager learn from the transformation of ING?

Friday, September 13th 2019 – 4PM - 5:30 PM Workshops Meet & Greet Center

Workshop 1: How to prepare for the hospital of 2050?

7 experts sharing their knowledge on 7 concrete guidelines, action points that the hospital management can start immediately.

Supported by In4Care

Workshop 2: The reuse of electronic health records for Learning Health Systems

Workshop 3: Imec's view on digital health

Workshop 4: Challenges and roadmap for Mental Health

Friday, September 13th 2019 – 5:30PM - 6:15PM Closing Ceremony Meet & Greet Center

Keynote Speech:

Mr. Bob Delbecque

Summary of the three days of the 28th Congress of Hospital Managers

Invitation to the 29th Congress of Hospital Managers in Budapest by the Hungarian Delegation

Award Ceremony Abstracts

Mr. Philippe Blua President EAHM (see below)

Closing words Mr. Philippe Blua President EAHM

Mr. Danny Havenith

Chair of the 28th Congress of Hospital Managers 2019

Friday, September 13th 2019 – 8.30PM - 11 PM Networking Variété Event

Communication

The communication was beside the logistics the big challenge of the congress. In advance, we sent out a monthly newsletter starting in January 2019, introducing the concept and each of the six topics, the various hospitals, the Gold and Platinum Partners and the Chairman. The ABDH-BVZD has made six commercials, which were also available in the newsletters.

Advertising has also been disseminated via social media LinkedIn and Twitter.

The website, the linchpin of the communication has been continuously updated according to the developments. All necessary information about the enrolment, the program, the speakers, etc. can be found on it.

As part of the collaboration with Roularta (Belgian publishing group), filming took place during the congress. After the congress, all participants had the following audio-video documentation available

- An introductory video of all six hospitals shown in the buses on the way there
- a content summary of the 6 sessions in the hospitals
- a summary of the contents of the inauguration ceremony, the workshops on Friday afternoon and the closing ceremony
- A video recording of all lectures (insofar as the speakers have given their consent).

The same applies to the Power Point presentations of the lectures, all of which were available on the website, in so far as the speakers have given their consent.

Last but not least, there was a photographer who captured the story in pictures during the congress.

Logistics

The logistics were next to the communication the big challenge of the congress. The aim was to organize a decentralized congress, to bring people in small groups in a thematic way to innovative hospitals in the region. It was important that they were in the hospitals early, so that the program could run there in a scientific framework.

Associates

Such a Congress could not be carried out without the financial support of industry. Since 2016, the ABDH-BVZD has addressed the Belgian and European representatives of the healthcare industry and convinced the concept. On the one hand there is the visibility for the congress sponsors in the context of logo use in the most varied places and the exhibition area in the meet and greet area.

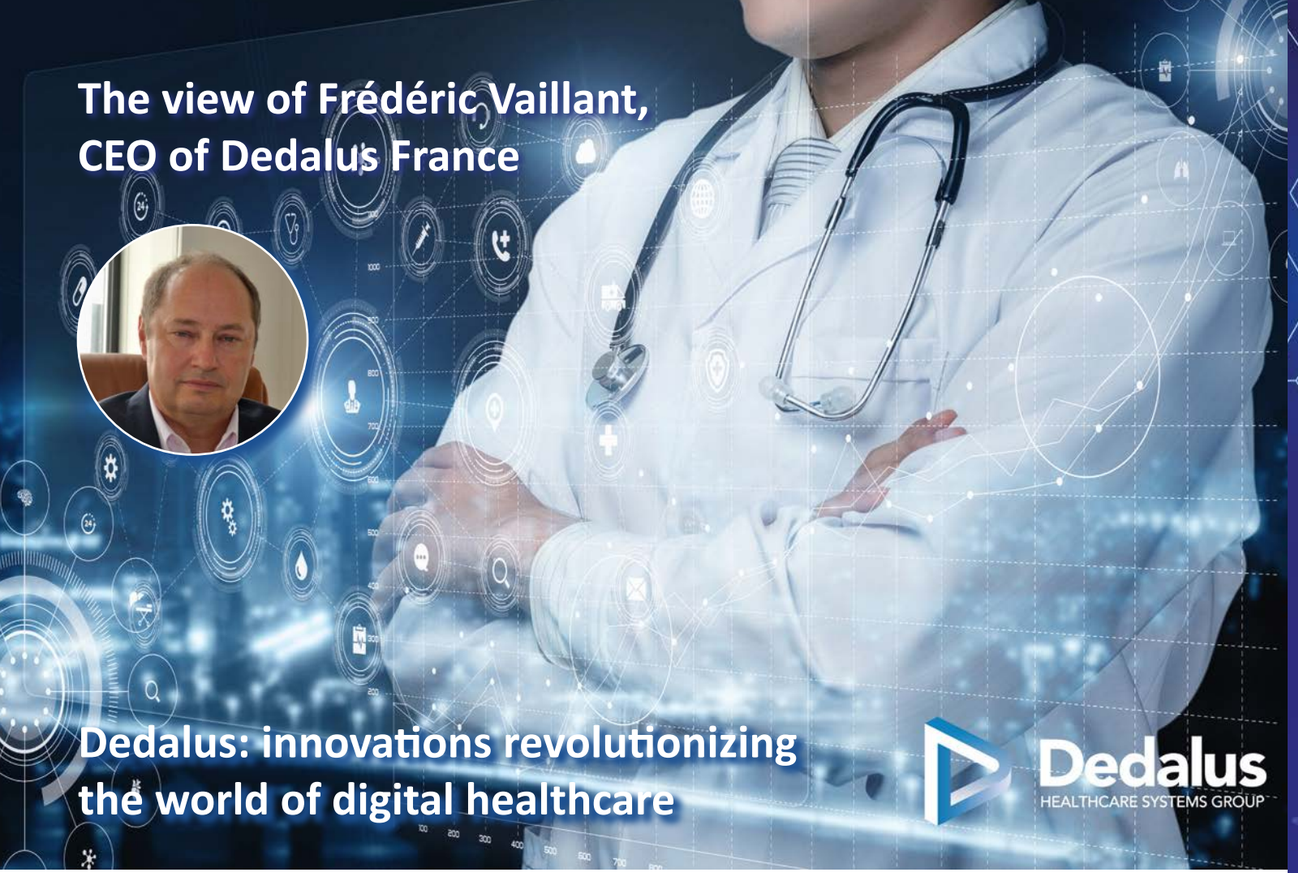
However, because of the decentralized venues participants were often on the go, the second, much more substantial starting point for doe sponsors came to fruition.

All gold sponsors had the opportunity to suggest a speaker in one of the sessions. This allowed them to get in direct contact with the hospital managers.

For the sponsors of the pharmaceutical industry, the congress was accredited by Mdeon (for Belgium) and MedTech Europe (for Europe). ■

Belgian and European Association of Hospital Managers
eahm2019.eu/

Platinum Sponsor:	*Iss*
Gold Sponsors:	*Bd, Detoo, Ecclesia, Eeg, Ge-Healthcare, Ing, Janssen Pharmaceuticals, Johnson & Johnson, Roche, Siemens Healtheneers, Vifor Pharma, Worldline, X-Perthis*
Silver Sponsors:	*Abb-Vie, Baxter, Chg Meridian, Medtronic, Mölnlycke, Sham*
Stand Partners & Divers:	*Antares, Axynesis, Eahm&Egve Hungaria, Gs1, Healthmanagement.org, Telenet*



The view of Frédéric Vaillant, CEO of Dedalus France

Dedalus: innovations revolutionizing the world of digital healthcare

“The Dedalus group is the main healthcare and diagnostic software provider in Europe. It ranks fourth in the world among publishers specialized in the digital transformation of healthcare. The presence of investment fund Ardian in the shareholder structure guarantees the group’s stability. It also guarantees that the group benefits from the highest financial capacities in Europe. The Dedalus group gained its position relying both on organic growth and on various strategic acquisitions, such as that of Agfa Healthcare IT, and in the near future, that of the healthcare branch of integrator DxC Technology. Dedalus has consolidated its leadership as a pan-European player of the healthcare software industry, establishing itself as a market leader for healthcare informatics (HIS) and diagnostic informatics (DIS) in France, Germany and Italy, as well as in Austria, England, Ireland, Switzerland, Spain and Belgium. Dedalus also has a leading position beyond Europe – in Australia, New Zealand, China, Brazil, Argentina, Peru, Chile, Mexico, the United States, the Middle East and Africa. Dedalus is therefore present in over 40 countries.

Dedalus currently counts over 3,500 highly skilled employees – these numbers will soon be rising to 6,000. Dedalus also has the largest Research & Development team in its field in Europe, with over 1,100 people.

Thanks to its portfolio of next generation solutions, Dedalus caters for all of the needs of healthcare operators, supporting over 5,000 hospitals and 6,000 laboratories worldwide.

The D4U strategy: a strategy based on openness, interoperability and backward compatibility

Thanks to its market position and to its major Research & Development team, Dedalus sets itself as the essential player of the digital transformation of healthcare.

Our approach is multifaceted. It is based on our strengths in the field of health information systems but also on our abilities in the areas of laboratory diagnosis, anatomic pathology, genetics and imaging. We have initiated numerous innovations which revolutionize the word of digital healthcare:

- We are introducing a new PACS system including the best viewer solutions on the market.
- We are developing a mobility initiative, to transform user workstations completely and centralize as much information as possible on a single mobile terminal. This initiative is called “From Data to People”. Its aim is to transfer to the medical and nursing staff only the information which is relevant for them at their own specific level, in order to reduce the cognitive load and optimize interactions with digital tools. We are striving to combine within our global strategy higher security levels, traceability and ways of improving the quality of working life for nursing teams.
- We use as part of our work a revolutionary “Digital Pathology Next Generation” tool, which optimizes the prescribing process and supports decision-making on medical conditions using imaging, anatomic pathology and laboratory testing.
- We are integrating the Clinical Knowledge Portal (CKP) – a new community tool for physicians and nursing staff. The basic version of the Clinical Knowledge Portal will be provided for free by Dedalus. It will enable users to share prescribing methods and work habits, in order to eventually support prescribing and decision-making. We are working towards integrating the main industrial players specialized in the field, to enrich the content of this portal. The CKP will become the strategic tool of any Dedalus software suite. We will integrate it fully in the health and diagnostic information systems.

The philosophy behind our strategy is that of openness, interoperability and backward compatibility. We have called this strategy D4u (“D For You”), to express our belief that tomorrow is not about designing health information systems, but about improving these systems through integration or replacement, thus avoiding any concerns about new use cases of a new generation. Our technology, based on the HL7-FHIR standard and the D4u microservice, was designed with this in mind.”

Dedalus

LIFE FLOWS THROUGH OUR SOFTWARE

Founded in Florence in 1982, Dedalus is the European leader in healthcare software, and one of the top companies in its field worldwide. Since 2016, the Dedalus group has been accelerating its expansion strategy. Based on a structural growth approach, Dedalus responds to the significant needs expressed by public and private healthcare institutions to rationalize and transform their Health Information Systems. Dedalus is now consolidating its position as a market leader for healthcare informatics (HCIS) and diagnostic informatics (DIS) in France, Italy and Germany. Dedalus also has a strong presence in Austria, Switzerland, Spain, Belgium, China and Brazil, as well as in multiple sites in Latin America, the Middle East and Africa. Dedalus is present in over 40 countries worldwide.

3600+ staff worldwide

1200+ staff in R&D

5000+ healthcare institutions supported

5000+ laboratories supported

Dedalus HEALTHCARE SYSTEMS GROUP

MBA Healthcare Management:

Concise Management Program for HCM Executives

Goals and Benefits

This study program aims to convey management training in the health care sector on an academic basis. This includes the necessary understanding of the healthcare market, analytical skills, social competences, controlling, marketing, strategic and operative health care management, system comparisons in the health care sector and further topics.

One important goal of the MBA study program is to improve the leadership competence of executive staff members of public and private health care institutions, pharmaceutical companies and the medical-technical industry. It also aims to support top executives in their decision-making roles.

The Executive MBA Health Care Management is international

- international course venues
- internationally renowned speakers
- international group of course participants
- internationally relevant issues

Study Locations

The MBA study program takes place at various strategic venues: Salzburg, Berlin and Washington D.C. These unique locations offer great infrastructure with modern classrooms. They are part of an internationally oriented concept. Seven modules are in German language, the US module is taught in English.

Target groups

- Doctors seeking competence in management
- People either working or wish to work in the healthcare sector, the pharmaceutical industry, or in the medical-technical and seek to qualify themselves for a leading position via the knowledge transfer offered in the MBA-HCM program
- Alumni of corresponding fields and branches of study (or comparable qualification) seeking to gain additional high-quality management expertise

Application criteria

Academic degree which qualifies for a position in a healthcare institution, with occupational activity in this area, OR a qualification comparable to an academic degree (e.g. at least 5 years of experience in a responsible, leading position in the health care sector).

At a glance

- Start: Fall 2020
- Duration: 4 semesters, 7 (8) modules of 5 or 6 days each (40 – 45 days)
- Venues: Salzburg (Austria), Berlin (Germany), Washington D.C. (USA)
- Number of participants: max. 20
- ECTS: 90
- Degree: Exec. MBA in Health Care Management (awarded by the University of Salzburg)
- Accredited by FIBAA ■

For more information: https://www.smbs.at/executive-mba-health-care-management/

Sharing a patient's health data between primary, secondary and tertiary care, and across borders

Luxembourg rolls-out Electronic Health Record and operates cross-border health information services

Miguel, an elderly man aged 65, collapses in the supermarket. An ambulance brings him to the hospital's emergency department. He has slurred speech and is therefore unable to explain his symptoms or medical history. Fortunately for Miguel, the emergency doctor has access to a digital tool that is very valuable in such a situation: the patient's Electronic Health Record (EHR). It tells him that John has diabetes, and is on multiple medications and on dialysis. This precious information allows the doctor to better (and quicker) evaluate the required medical examinations to perform, and to take more accurate decisions.

This is just one of the many use cases where an EHR is beneficial to both the healthcare professional and the patient. Since it holds a patient's key health information in one central place, the EHR allows all healthcare providers involved in a patient's care pathway to best advise the patient, assure optimal medical treatment and an efficient coordination and follow-up thereof.

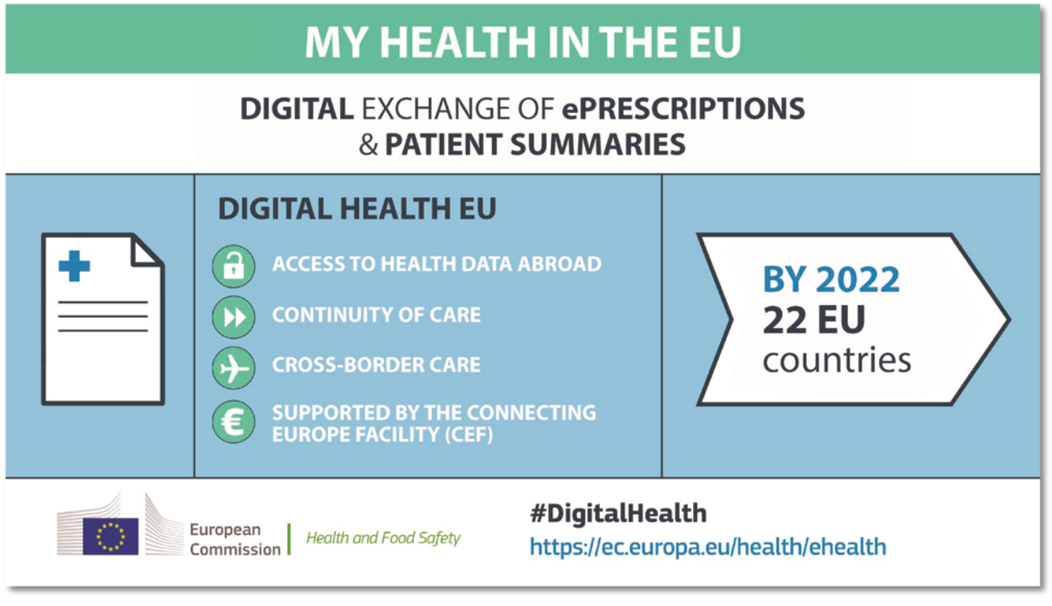
Luxembourg health authorities have also identified the digital healthcare record as a central element for improved quality of care, and as one of the digital health solutions helping to improve exchange of health data, care coordination and patient empowerment.

The legal basis for implementing such an EHR in Luxembourg is provided by article 60quater of the Social Security Code, which states that Agence eSanté - Luxembourg's national eHealth competence centre - has the mission to make available, to providers and patients, an electronic health record called "Dossier de Soins Partagé" (DSP). Same article also stipulates that the terms and conditions for the implementation of the DSP must be specified by way of a Grand-Ducal Decree.

An EHR is generally defined as a real-time, patient-centered record that provides immediate and secure health information to authorised users. It typically contains a patient's medical history, diagnoses and treatment, medications, allergies and immunisations/vaccinations, as well as radiology images and laboratory results.

The DSP was launched in May 2015 as a pilot programme for patients with multimorbidity and chronic diseases who sign up with a care coordinating GP, and extended to "voluntary patients" a couple of months later. The general roll-out was to wait until the Grand-Ducal Decree was published, which happened on 6 December 2019. This officially closed off the pilot phase, which saw in total 59 138 DSPs created, together containing more than 314 281 documents in total, representing on average 5.3 documents per DSP.

With the decree having come into force as per 1st January 2020, Agence eSanté has meanwhile launched the general roll-out, and aims to have created a DSP for all Luxembourg social security affiliated persons – some 860.000 persons - by end 2021 at the latest.



The scenario given at the beginning of this article could become even more complicated if Miguel is not a Luxembourg resident, but, instead, a Portuguese tourist traveling to Luxembourg, who does not speak any other language than Portuguese. How to bridge such a linguistic gap between the healthcare provider and the patient? The solution brought forward by the EU: by means of the **cross-border electronic exchange of a patient's Patient Summary.** It is one of the two standard documents electronically exchanged within Europe, the other one being the **ePrescription**.

These cross-border health information services are made possible thanks to "**My health @ European Union**", the eHealth Digital Service Infrastructure which connects the eHealth national services allowing them to exchange health data, and which is funded by the European Commission's Connecting Europe Facility. This CEF eHDSI solution gives EU countries the possibility to exchange health data in a secure, efficient and interoperable way.

The electronic cross-border health services ensure the continuity of care for European citizens while they are travelling abroad in the EU. Given the huge number of commuters who work in Luxembourg (200.000), and the considerable number of inhabitants of the Greater Region (Wallonia, Saarland, Rhineland-Palatinate, Lorraine, Luxembourg) who call upon the services of a Luxembourg hospital or doctor (both for unplanned and planned care), it is very important for Luxembourg's health care system to be able to deliver cross-border eHealth services. Participating in the CEF eHDSI programme therefore was but a logical next step to take for Agence eSanté.

In June 2019, Agence eSanté launched its 1st cross-border health information service: the electronic retrieval of a Patient Summary. Accordingly, a doctor practicing in Luxembourg will be able to receive digital Patient Summaries of travellers coming from Czechia, Malta and Portugal, and from Cyprus later on.

Later on, Luxembourg's Agence eSanté will provide two additional eHDSI services:

- In the course of the 2nd half of 2020, Luxembourg expects to operate the use case in which a Luxembourg citizen's patient summary is sent to a healthcare professional abroad : this will allow Luxembourg patients to benefit from retrieving their patient summary when treated by a foreign health professional abroad, based on the patient's explicit consent.
- In the course of 2021 it will operate the use case of sending an ePrescription - prescribed by a Luxembourg doctor - to a pharmacy abroad so as to allow a Luxembourg citizen to retrieve his medication there.

The following two electronic cross-border health services are currently progressively introduced in 22 EU countries:

Patient Summary *provides information on important health related aspects such as allergies, current medication, previous illness, surgeries, etc. It is part of a larger collection of health data (Electronic Health Record). The digital Patient Summary is meant to provide doctors with essential information in their own language, which is helpful if the patient comes from another EU country and he doesn't speak the doctor's language.*

On a longer term, not only the basic medical information of the Patient Summary, but the full Health Record should become available across the EU.

ePrescription (and eDispensation) *allows EU citizens to obtain their medication in a pharmacy located in another EU country, thanks to the online transfer of their electronic prescription from their country of residence where they are affiliated, to their country of travel.*

By 2022, 22 Member States will be part of the eHealth Digital Service Infrastructure and expected to exchange ePrescriptions and Patient Summaries: Austria, Belgium, Croatia, Cyprus, Czechia, Estonia, Finland, France, Germany, Greece, Hungary, Ireland, Italy, Lithuania, Luxembourg, Malta, The Netherlands, Poland, Portugal, Slovenia, Spain and Sweden .

EAHM Europe Day

at the German Hospital Day

Düsseldorf - 18.11.2020

MEDICA CCD-East - 9.30 – 13.00

Post-pandemic perspectives for European Hospitals – Aspects and challenges of hospital management

Last Minute Information:

This event has been canceled due to the worsening of the COVID-19 pandemic

The corona pandemic has changed lives worldwide. Healthcare in particular is being put to the test at many points. A lot will have to change, existing structures and processes will be reviewed and will change. Especially in Europe, we will have to find answers as to whether and how the EU and the member states with the existing institutions and their cooperation have proven themselves in this crisis and what needs to change.

The aim of Europe Day this year is to exchange and reflect on the experiences in the hospitals in the pandemic and to derive and discuss recognizable consequences for health care and for the structures and processes for the hospitals. The focus will be on the perspective of hospital management.

The event begins with an overview from the perspective of the WHO with the aim of describing the situation in Europe and the European countries and showing possible need for action.

Then, in a second step, practical experience from hospitals in the member countries is presented and discussed.

On this basis, there is a discussion about the perspectives that arise from the experience of, among other things to answer the following questions:

What do we learn from the experience? What must we do differently / better in the future? What role does the European Union play in this?

Program

9.00 - 9.30 : Registration

9.30 - 9.40 : Welcome / Introduction

Philippe Blua, President EAHM

Moderation : Marc Hastert, General Secretary of the der EAHM

9.40 -10.10 : The pandemic from the perspective of the WHO

Representative of the WHO

10.10-11.10 : Experience with the pandemic in Europe

Antoine Malone, France

Eric Svanfeldt, Sweden, International Coordinator Health and Social Care Division, Swedish Association of Local Authorities and Regions

Peter Asche, Germany, Director University Hospital Aachen, Vice-President VKD

Dr. Ari Lajos, Association of Hospital Directors in Hungary

11.10-11.40 : Break

11.40-12.40 : Round table:

What do we learn from the experience? What must we do differently / better in the future? What role does the European Union play in this?

Rolf Gilgen (Chair), lic. iur. Rolf Gilgen, CEO Spital Bülach AG, Switzerland, President of the Hospital Directors in in Switzerland

France Germany Hungary Italy

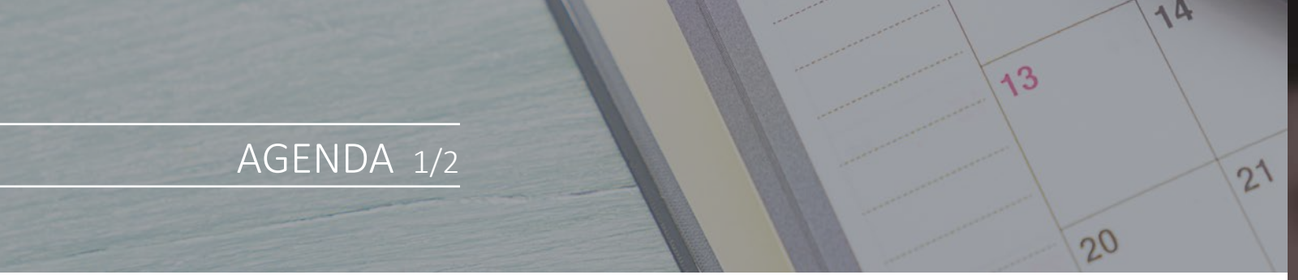
12.40-13.00 : Discussion and summery

Heinz Kölking, Dipl. Economist Heinz Kölking

Member of the board in EAHM

More info :

https://www.medica.de/de/Foren_Konferenzen/Konferenzen/Deutscher_Krankenhaustag



AGENDA 1/2

2020

Smart Health International Conference

Healthcare of the future, patient well-being and optimization of hospital management

30 september - 1, 2 october 2020 - Troyes, France

With a special Session about COVID-19 crisis on Friday afternoon, 2. October 2020

www.sheic2020.com

EAHM EUROPE DAY during the MEDICA Fair

18. November 2020 – Medica Düsseldorf, Germany

CANCELED

IHF Virtual Forum - Learning from COVID-19, Transforming Health Services, a virtual forum for hospital and healthcare leaders

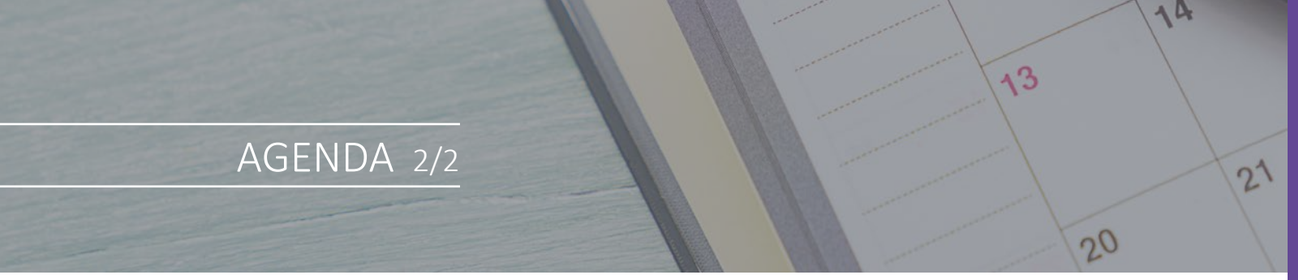
4-5. November 2020 ; Online Worldwide International Hospital Federation (IHF)

With a concurrent session for EAHM on 5 November, focused on transformations moving forward : 16:15 – 17:15 CET

www.ihf-fih.org

Association of Health Information Management Executives (AHIME) and ENTSCHEIDERFABRIK - Health Information Exchange Leadership Summit am 17.-18.12.2020 ; Congress Center (Haus des Gastes) in Obertauern (Austria).

https://entscheiderfabrik.com/anmeldung-zum-health-information-exchange-leadership-summit-vom-1712-18122020



AGENDA 2/2

2021

The 29th Congress of the European Association of Hospital Managers (EAHM)
29th Congress of EAHM – 27th Hungarian Healthcare Days

29. September – 1. October 2021 – Budapest, Hungary

Main topics:

Dr. Who: The Future of Health Professional Education
Ethics in the 21st Century
Hospitals Go Green
Future Technologies
Innovation and Financing and DRG
Big data and Informatics

eahm-budapest2021.com

See also page 20 to page 23

Smart
Health
International
Conference

www.sheic2020.com

Due to the Covid-19 situation, we are sorry to announce that SHeIC 2020 conference, scheduled to be held in 3-5, June 2020, will be postponed to September 30 and October 1 and 2, 2020, in Troyes - France.

SHeIC 2020

Healthcare of the future!

30 september, 1&2october **2020**
Troyes, France

OFFICIAL GUIDED TOURS

VISIT THE CAPITAL ACCOMPANIED BY AN OFFICIAL GUIDE FROM THE LUXEMBOURG CITY TOURIST OFFICE

luxembourg
my city · ma ville · meng stad

© Marc Lazzarini-Standard/LCTO

The Luxembourg City Tourist Office organises regular guided tours of the city of Luxembourg on a daily basis as well as guided tours with a private guide. In high season, guided tours of the grand ducal Palace are organised for limited periods. The Bock Casemates can be explored on a guided tour while open.

Since places are limited, it is recommended to buy your tickets in advance, either online or at our reception desk on Place Guillaume II. All information can be found on luxembourg-city.com in due course.

REGULAR GUIDED TOURS IN 2020

• City Promenade • Wenzel Circular Walk • Bock Casemates
• grand ducal Palace (during summer)
Check our website for our seasonal guided tours!

14–18 €: Adults / **12–15 €:** Students and seniors /
7–9 €: Children from 4 to 12 years / **Free:** for children under 4 years

GUIDED TOURS WITH PRIVATE GUIDE

30 circular walks in up to 25 different languages!
Contact us for further information.

110 €: 2 hours and up to 25 participants per guide /
+ 40 €: per each additional hour or part thereof

RESERVATIONS

Tel.: (+352) 22 28 09-79 / guides@lcto.lu

luxembourg
city tourist office

30, Place Guillaume II · L-1648 Luxembourg · Tel.: (+352) 22 28 09 · touristinfo@lcto.lu · luxembourg-city.com

Use your assets to create a better future.

Having built your assets based on your priorities and values,
you require unique banking solutions that are tailored to your needs.

www.bil.com/private-banking

BIL
1856

PRIVATE
BANKING

Together for you

BEIJING • DENMARK • DUBAI • LUXEMBOURG • SWEDEN • SWITZERLAND