Elizabeth Sukkar: Hello and welcome to this webinar, “Future gazing: Healthcare in 2021 and beyond.” My name is Elizabeth Sukkar. I’m Managing Editor and Global Health Care Editorial Lead at The Economist Intelligence Unit. Before the COVID-19 pandemic, many clinician visits with patients were undertaken face-to-face, but the pandemic sent entire communities into lockdown, meaning healthcare systems had to adapt quickly to digital and telehealth approaches like remote care and virtual monitoring of patients, without knowing whether these would be effective or feasible. It seems today’s plugged-in society is more primed than ever for shifting care, where the home has become the hospital or where we transition to a model of healthcare at any address. This transition has been driven by data and technologies. And while we’ve had a taste of it during these turbulent times, how much of it will stick? What are the challenges and benefits and what will the future healthcare landscape look like for you and me? I’m really happy to welcome our expert panel today where we hope to discuss this and more.

Today we have Mobasher Butt, the Chief Medical Officer at Babylon, an organization known for its digital primary care doctor service and for an app that uses AI it has developed for the National Health Service. Also, we welcome Prat Vemana. He’s the Chief Digital Officer at Kaiser Permanente, a U.S. healthcare provider that serves over 12 million people in 39 hospitals. We also welcome Kristin Ficery, who leads Accenture’s North American health practice as a Managing Director. The practice advises health systems, payers and other players in the healthcare industry. And finally, Don Woodlock is Vice President of Healthcare Solutions at InterSystems. Don oversees software platforms used by healthcare providers around the world. We also extend a big thank you to InterSystems for sponsoring this webinar.
Let’s start with thoughts on what the healthcare experience will look like this year and in five- and 10-years’ time. Kristin, would you like to start off?

**Kristin Ficery:** Thanks, Liz. As I think about healthcare, and its new future, I see profound change. We’re pivoting from customers coming to healthcare to healthcare going to customers. I’m excited about that because it reminds me of the healthcare I experienced growing up, which was really effective. I spent many of my summers working in the clinic my grandfather built beside his house in Natrona Heights, Pennsylvania. He built that clinic because he wanted to be close to the community he served. The hospital where he was on staff was 12 miles down the road and it was very difficult for patients in that small town to get to in many cases. I saw how he was there, present, and taking healthcare to his customers. In fact, he actually did house calls and so on any given night, he was out delivering a baby or checking on a patient that had chest pains. His community really appreciated the way in which he brought healthcare to them and made the experience much more effective. We have an opportunity now to make house calls a reality again.

**Elizabeth Sukkar:** Thank you, Kristin, that’s really interesting. Prat, what’s your take on this and what the future holds: how do you see it?

**Prat Vemana:** Kristin summarized it well. The biggest opportunity we have this year is the momentum COVID has created. The ability to bring telehealth to a convenience level that enables everybody to access care anywhere, anytime. But the five-year journey Kristin is alluding to is impactful in the sense that we can go beyond providing care at the time of need to include preventative care and overall health and wellness. Digitization can pave the way to do that, which I think is an exciting part of what we all dream about and are starting to build toward.

**Elizabeth Sukkar:** Don, can you tell us what your thoughts are on this in the future?
**Don Woodlock:** Sure, I certainly like this concept of bringing care to the person. I think the future with digital tools will be more patient-centric and more physician-centric. By patient-centric, I don't mean just more friendly and convenient, but more about the person being treated. One of the projects I really like in London is the NHS's Coordinate My Care project where patients can work with their clinicians regarding their end-of-life care plans. They can document that and then those care plans are available for anybody: the ambulance driver, the family members, the patient, the GPs, the caregivers. Everybody knows how the patient wants to end their final days and then that care becomes much more focused on them and really reflects their wishes. So, digitizing and bringing information to everybody that needs to know really enables the care to be more focused on patients. On the physician front, I think a lot of the tools that address conversational user experience and interacting with the clinical data via chat bots can help to make that experience more about them. Data can empower the people involved in the care system to make the experience more convenient, more enjoyable and more impactful based on what they're trying to do.

**Elizabeth Sukkar:** Thank you, Don, I'm glad you raised palliative care; that's not a topic that's often raised. And Mobasher, what are your thoughts then for the next year, and five and 10 years?

**Mobasher Butt:** I think we only need to look at the past one, five and 10 years to know change in healthcare is coming at a very fast pace. A lot of that change has been enabled by rapidly improving technology, whether it’s sophisticated diagnostic capabilities or the growing use of AI like we’ve used at Babylon. That said, I think it’s clear that the future of healthcare is not about using technology such as AI to replace doctors or clinical best practice. In fact, I think the use of these kinds of technologies is about supercharging the work of physicians and augmenting best practice. Perhaps even more exciting, I think this type of technology helps create a world in which an exceptional health care experience is not just for the wealthiest members of society. As a doctor who's practiced in both private and public health systems, I've seen what exceptional healthcare looks like and know it is achievable, but you need a lot of resources, whether people or money, to achieve it. But with digital technologies like AI, we've got a great opportunity to create an exceptional healthcare experience at a fraction of the cost and without the need for so many doctors and nurses, which will hopefully help us achieve better outcomes for patients no matter where they are on their healthcare journey. Ultimately, if we get this right in the next one or five or 10 years, healthcare should become a much more seamless experience for patients and providers. We can start to close out some of the fragmentation we see today. I think there are some key areas where this technology-enabled approach will really help. The first one is delivering integrated care with a strong focus on outcomes. Another is improving the management of chronic
disease. Third, increased capabilities for remote monitoring and remote consulting. A lot of that will be delivered via what we all carry in our pockets: the smartphone. If you think just how far these devices have come to date, their capabilities 10 years from now will no doubt be staggering.

Elizabeth Sukkar: Thank you for that, Mobasher, and you've raised a lot of points I want to discuss in this talk today, but back to you Prat. Let's look at other industries for a moment. Are there elements or best practices from other industries involving information and a seamless consumer experience that the healthcare industry can learn from?

Prat Vemana: A great question. Coming from retail, it is true other industries have traveled in the digital space, especially this idea of convenience and consumer-centric experiences. The idea of access anywhere, anytime, whether it's banking, whether it's travel; the ability to access the information quickly. You get the convenience that you need and the answers you want very quickly. We can borrow a lot from banking and travel, capturing insights driven by data and leveraging that to create experience. Look at retail: it's not about the hundred million products in the catalog. By typing in three words, they already know what products you need. That kind of intelligence is what we are seeing in retail. Also, getting digital assistance. If you look at what the Telco's of the world have done in terms of chatbots, which can take care of the most frequently asked, mundane questions, I think we can learn a lot from other industries. Now, I'd like to turn that into "where healthcare is today." There are several things we look at. Healthcare has mostly been a post-visit engagement from a digital perspective: I came in and visited my physician, then I need to access my prescriptions and labs and any notes from the visit and deal with any follow-on issues. It's very heavily focused on the post-visit engagement. Also, as Don touched on, there is the idea of how the provider and workflow actually drive the healthcare experience. We can flip it and say as a consumer, what is my experience going to be? We have the idea of engaging only at the time of need, whereas I think we can be there holistically all the time via digital. We can learn from some of the big shifts that other industries have done quite successfully and use them in the healthcare space.

Elizabeth Sukkar: Don, I'd like to ask you another question. Taking the experience of the pandemic, to what extent are policy makers and the industry capitalizing on the shift in attitudes now among stakeholders to use digital services to drive a long-term transformation?

Don Woodlock: I think the pandemic has taught us how critical good health data is when it comes to taking care of a community and quickly adapting your organization. Lots of our health system customers say they would not have been able to respond so quickly if they hadn’t had that kind of consolidated EMR infrastructure. Setting up new hospitals, rearranging floors, closing ICUs and turning them into COVID
floors; all that was done incredibly quickly because of that digital infrastructure. I do think all of us have come to appreciate the investments we’ve made over the last decade to create that platform where we can be nimble and agile and respond so quickly to the pandemic. That’s really been a strong suit, and I would agree with Prat on learning from other industries, leveraging data to really drive change, to drive innovation, to learn and be more insightful about taking care of a community or a population. Other industries do that well and healthcare is just trying to do that now. Having accurate reporting on COVID, whether testing, vaccines and case rates and whether we’re at the peak or the peak is coming. That’s been very critical, of course, in managing this pandemic. Without data, it would be difficult for us to have been as successful as we’ve been at managing this.

Elizabeth Sukkar: Thank you, Don. Kristin, to you, since we’re talking about the hospital sector now and secondary care, can you talk us through what parts of the care pathway in hospitals and specialties are more aligned or more open to digitalization?

Kristin Ficery: There are lots of opportunities for bringing technology to support some of the changes around that care continuum. We talked a little about chronic care management and I’m thinking about the ways in which we have an opportunity to influence the care of a chronic care patient. For example, we believe that with a diabetes patient, there are 10 moments that matter and many of them are outside of the purview of a clinician. This is where digitization and access to data is so important because those moments that matter are going to pull from some of the retailers that are doing pharmacy and have pharmacy data, and maybe from a grocer that is providing information about the diet of that patient, or maybe it’s something like their exercise equipment that’s telling you information about how much they’re exercising. The ability to bring technology together and connect all those elements is so important and is going to enable us to have a much more holistic picture of the patient and influence care more proactively going forward.

Elizabeth Sukkar: Prat, back to you: because you’re involved in so many hospitals, can you talk us through the digital transformation of your hospitals? What was the easy, low-hanging fruit and what has proved harder to accomplish?

Prat Vemana: Before COVID-19, we were doing telehealth for a long time: about 12% to 14% of our care was always delivered via telehealth, so we always had success in this area. But with COVID-19, we needed to shift to nearly a hundred percent telehealth. Roughly 90% of our ambulatory care needed to be shifted, and we shifted almost 100% of our mental health visits. Here’s what I’m talking about: between phones, emails, and video visits, we delivered over 15 million interactions in 2020 alone. What that meant was, not only is the consumer shifting to these new modalities and being comfortable with it, but also providers are shifting to
these new modalities. For them to become comfortable with the technologies, they’re trained to feel the belly and then touch the patient and see the vitals. How do you do that in the best possible setting in a telecare environment? I think the one of the biggest shifts we saw was the mindset shift in terms of adoption and acceleration. The second thing is self-care. As COVID-19 was unfolding, everybody was looking for information on how to know whether they had it or not. How do I know I can prevent it? Making available effective information and highly interactive AI experiences that can give you preliminary information on whether you have a high or low risk – things of that nature had to be transformed as well. In the hospital’s physical setting, we needed to adapt very quickly. How do you triage bringing in thermal cameras, for example, as patients walk in? How do you safeguard the staff in the hospital to make sure they are protected as well, because they are the frontline workers that we needed to protect? In quite a few ways, it has been impactful across the hospital and the delivery system.

Elizabeth Sukkar: Thank you for that. We’ll come back to secondary care in hospitals. Let’s jump back to primary care now so we can ask Mobasher a few questions. So Mobasher, in any future digital model of care we’ll need to consider the role of the gatekeeper to healthcare systems, which is your GP or family position in the U.S. In the UK, we’ve seen a lot of GPs turn to remote care, mainly via the telephone, during the COVID-19 crisis. But what can you expect primary care to look like in the future? Also, will we have fewer family physicians on the high street? And will we lose that kind of local neighborhood care with this move to remote care?

Mobasher Butt: There definitely has been a huge shift to remote care in the primary care setting. For some people that’s been a great experience for both the patient and the provider, but I think there should be a word of caution about it. It’s important to ensure that when you’re delivering care in this way, it’s designed from the ground up. If you think about the sort of things people have had to adopt in a primary care setting, they may not have a system that enables them to deliver this type of care and so they’ve had to rely upon technologies like conference calls, Skype, or Zoom. And that’s great because it connects the doctor and the patient, but it’s not an overall digital experience. For instance, the booking of the appointment could still be very clunky and cumbersome, and the patient receives no reminder on their phone that their appointment’s about to start and they need to get going to a quiet place with a good connection. There’s no digital pathway for them to be able to then pick up their prescription once the doctor’s issued it. I think that’s a big difference as far as what we’ve done in the primary care space, which is to design the whole end-to-end experience from the ground up, making it patient-centered. You’ve got to focus on the user experience, the interface, the design. Going back to what Don, Prat and Kristin were saying, I think drawing lessons from other industries is going to be vital because many of those sectors have made great progress in thinking about that whole user experience.
Elizabeth Sukkar: I was just going to ask you Mobasher, with Babylon, explain to our audience what sort of patients do you mostly see? Are they young? Are they digitally savvy? Are they without chronic medical conditions? It'd be interesting to see the kind of the patients Babylon sees because if this is the future, how it’s looking at the moment?

Mobasher Butt: When we launched Babylon six years ago, there was definitely a greater preponderance of working age, perhaps more digitally savvy patients. But what we’ve seen is that there’s been a big mindset shift in patients. I think our oldest patient is 94, so, with people at that age, their caregivers or family members can assist them in using this type of technology. We’ve had good success in using patient participation groups to help those less familiar with technology become familiar with it. In terms of the spectrum of issues, we see the full breadth of primary care, and for chronic disease management, it’s excellent because the doctor can connect to the patient in a very accessible way, and utilize a lot of digital tools that support the consultation in between consultations. The results of those things are available to the doctor in the consultation. So, the doctor can track things like nutrition or activity levels and see those objectively in the consultation.

Elizabeth Sukkar: Thank you, Mobasher. I might ask Kristin to comment here. What do you see as the future of our corner, local GP surgery in 10 years’ time? Are we going to have fewer numbers of bricks and mortar establishments and is that a good or bad thing?

Kristin Ficery: I agree with the points Mobasher said. We actually did a study—it’s almost 10 years old at this point—which was talking about the decline of the independent physician in America. At the time, it was driven primarily by economics and by the need to get physicians onto EMR. The technology burden was heavy and so many of them either retired or sought employment with health systems. I think those physicians still play a critical role and I wholeheartedly agree that we cannot let technology fully take the place of human interaction. That is so important going forward. We must find a hybrid. I certainly hope we’re not going to lose all of our physicians, but I think they’re going to change and our patients are telling us they want to have a hybrid option. Two-thirds of patients said they were willing to switch physicians if they didn’t have some kind of virtual option or if they had to be seen at a physical site. They wanted to make sure that site made them feel safe and secure and that they were following safety protocols. The third thing, which is actually very interesting, is they wanted to make sure their physician had up-to-date information on them and that it was secure as well. So, I think I see the physician’s role declining. I don’t have the latest data, but I suspect that trend is continuing. However, the gap is being filled with the Kaiser Permanente’s that have clinics across the country, and it’s being filled by other retailers like Walgreens and CVS and Walmart, who are putting together very
innovative models of outreach to the community. But again, I want to make sure we're mindful. We can't let technology totally take over. We must find that balance, and I'm seeing evidence that our healthcare community recognizes that that balance is very important.

Elizabeth Sukkar: Thank you, Kristin, and, as we know, healthcare systems and healthcare professionals very much rely on data, on evidence and effectiveness. So, let's just talk a little bit about telemedicine and its effectiveness. As you were saying Mobasher, if you're a doctor, you might have to manage a video platform. You've got to look at the electronic healthcare record, you might have an older patient, and he or she may be frail. So, what sort of research do we need to see whether remote and digital-led care is efficient and effective compared to standard care? I just want to know, what's the landscape at the moment in terms of evidence? Don, I'd like to hear your thoughts on the evidence space at the moment that we have.

Don Woodlock: I'm not sure we have much yet. The shift is relatively rapid. I do think that care in this model is certainly getting more longitudinal and more integrated. If you rewind back to the inpatient, hospital-only experience, it made its way to GPs and made its way to the home. Patients want to be healthy and they want their whole life cycle to be managed in cooperation with their care team, so I think the hybrid model, like Kristin was saying, is a perfect model to think through. In terms of the evidence and care, differences in terms of outcomes, I haven't seen a lot of studies about that yet. We have worked with several life sciences companies that have been quite interested in the effect of all this remote care has had on the patient visit experience, their adherence to medications, and their attitude toward their disease. There are certainly risks, especially during these pandemic days, certain care areas like mental health and cardiology and chronic conditions have been undermanaged. So, hopefully we'll get back to a state of “new normalcy” and be able to model this so we have the same or better outcomes with this new hybrid model.

Elizabeth Sukkar: Thank you for that, Don. I've seen studies showing telemedicine as safe, patient-centered, and efficient, especially during the pandemic, and for some rare diseases as well, which is really interesting. A lot of patients have been seeing their rare disease specialists. They have been able to do so via telehealth, which is fantastic. The reimbursement pathways for telemedicine have traditionally been a barrier to implementation. I'd love to understand from everyone, what needs to take place to adopt this into clinical pathways? Maybe Prat, you can start us off on that, thank you.

Prat Vemana: Absolutely, Elizabeth. And Don, if I could add one thing. Of the two areas that I look at, one is whether these modalities are effective for all the conditions. Can we say these types of modalities are better? If you have sinusitis, should it be video and in person only? Can it be by phone? Will it be effective on a phone? The biggest
thing we have done in 2020 has been to generate a lot of data in terms of not only the conditions and symptoms, but also which modalities are applied and how effective they are going to be. Even though we don't have data now, I'm strongly of the belief that in the next two to three years, we're going to see an incredible amount of data becoming available, research that's becoming available in this space on the effectiveness of tele-medicine based on the conditions and modalities. We've also seen in post-operative care, selective areas where digital is very impactful. Cardiac rehab, for example, we were able to fit the patients with smart watches and gave them very specific routines they need to take and so on. Not only did adoption go up, but the outcomes were also outstanding. What we're seeing is this ability to be much more targeted, applied at a programmatic level. Those two are good examples where we do see this digital technology applied digitally in the right way. There's a lot more to come that will shape the industry in the days to come.

Elizabeth Sukkar: Mobasher, would you like to comment on the reimbursement pathways? How do they need to evolve, because traditionally, there's been a barrier for telehealth? What are your thoughts on this, and Kristin’s as well?

Mobasher Butt: There certainly has been a barrier. In some countries, payers do not reimburse telemedicine, but that's changing, and I think in countries like the UK and the U.S. and others, telemedicine is now reimbursed. Our experience in the UK working with the NHS shows that even in a capitation-based model, where doctors are paid to look after a population of patients on an annual basis, the wide scale use of telemedicine has been really effective. The data is showing that if you use digital healthcare to improve accessibility and affordability in a primary care setting, you can see impressive results in terms of downstream savings in secondary care costs, because people are not presenting to emergency departments or emergency walk-in centers. I think that type of data is going to speak for itself and pave the way for better reimbursement of telemedicine. Hopefully, we will see similar changes in other parts of the world where it’s not currently reimbursed.

Elizabeth Sukkar: Did you want to add anything, Kristin?

Kristin Ficery: I wholeheartedly agree, and the barriers temporarily here in the United States did come down. We believe telemedicine needs to endure, and it needs to endure because our patients and our customers are counting on it. Back to the point we were talking about earlier, the pandemic has shaken the confidence of our customer base to the core. Last summer at one point, I came across a study that said 80% of Americans were fearful of walking into a hospital. We have to find ways to bring healthcare back to them and meet them where they feel safe, both physically and digitally. I agree with what Pratt was saying. We have several clients that think virtual is here to stay. We believe
it'll probably settle in at around 33-35% of virtual visits going forward, way up from less than 10% before the pandemic. We have several clients looking at which services and which patients are ideal for a virtual visit and how do you use analytics to identify that match and then set up the operating model – the staffing and so on – to support that encounter and that patient. We have an obligation as leaders to make sure we can break through some of these reimbursement challenges, because otherwise we’re going to have people not coming in for the care they need, which will create a lot of other challenges downstream.

Elizabeth Sukkar: Yes, that 80% statistic is quite stark. Great, let’s move the conversation now to the role of data and what data can do because everything’s going to be underpinned by data. Don, how we use data and how we access it will drive change in the future. In your opinion, how will data-sharing technologies continue to evolve and what will the future of healthcare data look like in five or 10 years?

Don Woodlock: We made a lot of progress bringing data together for the care of an individual patient, empowering a clinician to see that unified picture of the patient and make the right choices. That’s critical. Patients have co-morbidities, and a lot of the information about their other problems is in other systems. Bringing that together and empowering the caregivers to see that whole picture is perhaps phase one of what we’ve been working on. We made a ton of progress on that front. I think the next phase is around making data useful in aggregate for research, for artificial intelligence, for understanding populations, for collaborating with life sciences companies. The data really isn’t that clean yet or in a form that can easily come together, and you really need to invest to make that happen. I’m a musician and so whenever I go to somebody’s house and they have a guitar, I like to pick it up and whenever I pick it up, the first thing I do is check whether it’s in tune and if it’s not, I tune it. And the reason is, if you play guitar, there’s really nothing you can do with an out-of-tune instrument, even if you play well or have a great song, whatever, you have to tune it first. I feel like our healthcare data is there, but it’s badly out of tune. Step one is to aggregate it, normalize it, match patients, apply terminology, apply natural language processing, get it in a form where you really can use machine learning on it or learn things from a research point of view. And I do think an upcoming phase for all of us is making sense of that data and leveraging it to drive care going forward.

Elizabeth Sukkar: Thank you, Don. Kristin, back to you. There are some concerns by patients and others about data privacy and security – a topic that comes up often. Is that the biggest trust barrier and if so, how can we resolve it so data is used safely and sustainably for population health? There’s so much information locked up in that data. Love to hear your thoughts, and then we’ll ask Prat as well.

Kristin Ficery: Certainly. Don, I agree with what you’re saying about the untapped potential of the data that we
sit on. On the security point, I want to pivot to the cloud as well and roll these two altogether regarding the point about disaggregated data. At Accenture, we believe that by 2025, 80% of our clients across industries are going to be in the cloud. Today, we sit at about a quarter of that, so we have a way to go. But security is one of the things that is driving the CIOs to put this as a top priority, and we’re all acutely aware of security issues; they’re in the news now in a very material way and certainly we’ve been dealing with the issue in healthcare for several years. The risks are great. For a CIO, keeping up with those security threats is the challenge that is becoming even more challenging, especially given the constraints on gaining access to talent and the resources to mitigate it.

One of the reasons cited for using the cloud is the ability to mitigate some of those security concerns in addition to upgrading platforms and keeping up with all the demands for virtual offerings that we’ve all been talking about. We have to realize the cloud’s potential for harnessing this data in a way that enables you to connect the dots, as Don was saying. We sit on this treasure chest of data, but it’s in lots of different pockets, and as we move to the cloud, that data becomes much cleaner and much more aggregated. That enables us to introduce the AI applications that we’re all keenly excited about, because they will help us manage patient health and wellness. We must also must make sure our customers and patients feel their data is secure, because once they do, they will give us the consent to harness that data and more proactively manage some of the care plans for them, which will also mitigate risks. We’ve been talking a lot about the different types of data and where it sits. The high-tech folks are driving us to the cloud; big companies are driving us to the cloud. We’ve got to catch up, because once we do that, we’ll be able to stitch together the data that might come from my Peloton about some of my vitals or the data that comes from my grocery store about the healthy foods I’m buying. My clinician will be able to stitch that together in a much more holistic way. I think it’ll create a value proposition, but we absolutely need to make sure patients feel the data they’re allowing us to use is secure.

**Elizabeth Sukkar:** Thank you, Kristin. Prat, please feel free to add to what Kristin just said there, but I also have another question for you. Sometimes it’s said that hospitals are very nervous about sharing their data. What’s your take on this and the role of the cloud and progress in this area?

**Prat Vemana:** Kristin’s making some great points. Not only is data privacy important, but the patient also needs to know it is in the right hands. Twenty years ago, if you wanted to invest in stock, you had to know a broker because they had the data and they had the insights. Twenty years ago, if you wanted to buy a product, the retailer had a lot of data, but used that data primarily to optimize its backend operations. Today, hospital systems across the globe are using data to improve their backend effectiveness, whether it involves population
management or hospital utilization. The biggest shift we are going to see – that we have seen in other industries already – is that if the data can become a real time intelligence resource that’s useful for the consumer, it really opens the discussion there. Take my kids, for example. With an app, they’re able to invest in the stock market because they know what the data is; they have the power of the data right in their hands, and you’re seeing that in retail as well. I think the healthcare shift involves moving data usage from the backend. Applying the data in real time or near real time for patients or consumers will help them manage their health, wellness, and chronic conditions: this is going to be where the floodgates are going to open. It’s very important that we go there because, number one, that gives us scale. Number two, it also compels the consumer to manage his or her lifestyle. Kristin talked about moving from a provider-centered experience to consumer-centered experience; the experience then becomes holistic actually. These pivots will help ease the concerns that members have, but can also enable them to see the usefulness of providing the data.

Elizabeth Sukkar: Thank you. Mobasher, what sort of data would Babylon love to get its hands on that you feel would help improve outcomes for patients? At the moment, can you easily get say, the electronic health records for patients that use the service privately? I mean, you have to get permission, don’t you, for GP services? Can you explain it to us?

Mobasher Butt: I think the challenge you’re describing involves improving the interoperability between different health systems, and that’s obviously a big challenge that many health systems globally face. It is difficult for one EMR system to talk to another EMR. But I think there has been progress in this area. You can use other technologies like robotic process automation to transfer data safely from one area to another, even in the absence of a deeply integrated solution. With certain patients, we may have access to their full medical record. I think it’s interesting to think about this from the physician’s side of things as well, because in a standard consultation, the physician is already overloaded with data. There are many things to look at during a consultation and as we become more sophisticated, we can gather more data and create a new kind of medical record that will be a very complex longitudinal record with data points, which never existed in healthcare before. Now it will be all available to the doctor, at their fingertips. It is going to be imperative that we train our physicians to process that data in a timely and meaningful way during the consultation. While it’s great we have all this data and that interoperability issues are improving, we need to think about how we use the data, particularly at the point of care.

Elizabeth Sukkar: Thank you for that. Don, back to you on this. As you work in many countries around the world, which are showing the most impressive healthcare digital and data transformation in your opinion? I’m putting you on the spot here.
**Don Woodlock:** Well, I do have a fondness for non-U.S. experiences. We’ve seen a lot of great regionally-oriented initiatives. For instance, they might involve a minister of health for the Veneto region in Italy, or the Dubai region in UAE, or Lincolnshire in the UK. This minister has responsibility and clear ownership and accountability for the population and many of the hospitals and other facilities in that region. Maybe it’s like the Kaiser model in different parts of the world, where you take responsibility for a million or 10 million patients in your region. A lot of those regional coordination efforts, have been really terrific during the pandemic in terms of understanding what’s going on, where the hotspots are, where do we need to pay attention, and where do we need to add new beds or get ventilators or now get vaccines, that kind of thing. It’s where you can bring together a million citizens or patients or members, and you can make decisions properly and use data properly. Another example we work with is the VA [US Veterans Administration], and the VA integrates their records across our 130 EMR instances right now into this data platform. They’ve used that to coordinate vaccine distribution. They are successful based on data of how many vaccines they would need for their population. That’s been very effective. It’s apolitical, data-based in terms of what’s really needed to take care of that group of patients. It’s hard to pick favorites, but where I see that integration, and where that kind of clear accountability for a group of patients and citizens and members, I think it really works well.

**Elizabeth Sukkar:** Thank you for that. Let’s shift the conversation now to patient and inequity issues. The digital divide must be acknowledged. Not all patients have access to a smartphone, have suitable internet or have the digital skills to use technology. In such situations, how can we support patients so the future is inclusive? How can remote care retain the human touch and stay patient-centric? Mobasher, maybe you can start, please.

**Mobasher Butt:** This is an important issue. We’ve got to be mindful not to create a digital divide. I think we’re all embracing the digital approach and, as we’ve seen during the pandemic, the many benefits it can bring, but I think, certainly in our experience at Babylon, it is really about adapting the approach and the technology, tailoring it to populations or specific segments. As an example, our service is deployed in Rwanda, in partnership with the government and the Bill and Melinda Gates Foundation. There, we had to redesign everything to work on a basic feature phone and design the system so it complemented the existing healthcare infrastructure. The reason I’m referencing that is you can design digital services in a way that tries to mitigate against creating a digital divide, but it does take very purposeful design to do that. A final point: while it’s very important for us to consider this concept, we should be careful that it’s not used as a weapon to stop or slow down innovation.

**Elizabeth Sukkar:** Thank you for that. Kristin, do you have any comments about how we can keep remote care having that human touch?
**Kristin Ficery:** The pandemic has awakened all of us to our responsibility to our fellow man. Going forward, we now recognize that healthcare is everybody’s business, not just for our own families but more broadly our responsibility to our communities. I see a couple of key things happening. I see many of my clients talking about using a kiosk or using mobile-equipped buses to get care to communities. Even in Georgia where I live, we had buses that were going out into underserved communities with Wi-Fi to enable kids to dial in and do virtual schooling. I can envision we’ll see more of that happening in healthcare as we look for ways to distribute vaccines and care into underserved communities. The other thing we touched on is mental well-being. That’s an area we’re really focused on because I believe it will be our next curve to flatten. It’s an area that is underserved and is a huge issue in all of our communities. One in five Americans suffer from mental health issues and less than 50% of them are getting the care they need. Are there ways we can use digital solutions in this situation? Are there ways we can also use other resources to get to those people that need that care? Because that’s so important to all of the things we’ve been talking about, the whole health and wellness of our patients.

**Elizabeth Sukkar:** Thank you for that. I really appreciate it. Has anyone else got another comment at all about ensuring remote care has that human touch?

**Prat Vemana:** I can add to it. At Kaiser, being an integrated system and a nonprofit, we have the social reach, and we deploy resources very effectively all the time. I agree with all our participants here that COVID, the pandemic, did put a big bright light on this inequality. I’d like to add a few more use cases if I can. For example, using data to help overcome inequality. I’ve talked about using offline models to understand the social determinants of health. The ability to provide that assistance to the people who need it, those who would not have received interventions left on their own. Perhaps they needed a car ride back to the hospital or a nurse visit to the home, or wheelchair assistance. The idea of using data to help fight inequality is equally powerful there.

**Elizabeth Sukkar:** Thank you. Don?

**Don Woodlock:** That human touch is a route and I don’t think digital needs to take anything away from that. If there’s empathy in the process, if we can use digital tools to make it more human-centric for everybody involved, then we should do that. In terms of touch, let’s say, remote care can expand the number of people we can reach with specialists, with certain approaches—those with mental health challenges, for example. There are ways to use digital to both enhance the human aspects and the touch aspects of caring as long as we don’t get too focused on the technology and we keep with the human and the clinical needs that they have. I think digital can only enhance that.

**Elizabeth Sukkar:** Thank you for that, Don. We’re coming close to the end of the discussion and there’s one topic I’d
like to discuss with you. It’s about looking at the adaptability of healthcare professionals. Let’s look at workforce planning here. Maybe we’ll start with you, Prat. How prepared is the healthcare workforce for the digital future? How do you see their data, digital and maybe even their genomic literacy skills panning out? We need them on board for this to work in years to come. Prat, could you start us off and everyone else can add some comments as well?

**Prat Vemana:** Today, for care teams, digital healthcare is all about enabling and extending existing processes. As we bring in newer digital technologies, there are significant opportunities to help teams in meaningful ways. In the cardiac rehab example I mentioned earlier, we’re going to be in this 365/24/7 data creation mode. If I’m wearing a smart watch, I’m actually producing data all day long, right? Which of those data points matter for my physicians? And when does it matter? How do we organize it for them? How do we make sure that they are looking at a much more holistic picture so they can focus on the right areas? AI and other technologies can help make that easier for them. Today, you get charts for everything. I get a chart for my vitals. I get charts for labs – everything is a chart. And the onus is on the provider to synthesize. I have 20 minutes for a visit and I’m listening, I’m learning, I’m inputting data, but I’m also diagnosing. There’s only so much as a human, you can go through. The ability to look at it in a non-linear way, the ability to organize it, is a huge opportunity for making provider experiences easy and impactful. The second thing is the concept of care anywhere, anytime. Imagine a day where a nurse is coming to my house and providing the visit there at my place. What are the tools that we need to put in his or her hand to make sure they can reach back to the specialist with a click of a button? The ability for them to say here’s what we are seeing, and what should the diagnosis be? The ability to bring a provider from a hospital into the home via telehealth also matters. Achieving the right ease of use for tools and technologies has a long way to go for providers. Today, it is still in a very primitive state that focuses on documenting and providing electronic charts, with not a lot of intelligence.

**Elizabeth Sukkar:** Mobasher, what are your views then on how skilled the workforce should be to cope with a digital future? Has there been resistance towards this?

**Mobasher Butt:** I certainly think there’s a need to up-skill the workforce. That’s been highlighted in many seminal reports. There was a big focus on training staff to become enabled to use these types of technologies and to handle the data. In our own experience now delivering millions of telemedicine consultations globally, training has been massive as a component of that effort. Just putting a doctor at the end of a video isn’t the optimal way of delivering digital healthcare. It does require specific training and the development of specific skills in everything from the way you consult and examine a patient remotely to softer skills, such as how do
you build rapport with a patient using a channel like this? Training in all the things the workforce would benefit from is crucial. I'm hugely supportive of making this part of the medical curriculum and part of workplace training as well.

Elizabeth Sukkar: Thank you. Kristin, some people might feel threatened by life with robotics and caring and nursing, or AI diagnostics. What's the future for the workforce, in your opinion?

Kristin Ficery: I agree with what Mobasher just said. We have just experienced probably the most profound change in customer behaviors of our careers. And I think it's going to create a major opportunity for change management to follow that we've seen. I'm encouraged because I've seen our clinicians adapt to it literally overnight. If you think about it, we went from 7% virtual visits and that increased to 3,000% in a matter of weeks and they adapted. And obviously, I agree wholeheartedly with what Prat said. We've got to help our data scientists get their arms around what our clinicians are doing and bring the processing power to them to coalesce all that data we're now asking them to use in making important care decisions. That's a huge opportunity, but I also agree with the point we were making earlier, which is we cannot lose that human touch, which is so important to the relationship. It makes healthcare unique and makes our patients feel special. I think about what Mayo is doing down in Florida where they're using robots as well as care providers in some of their COVID testing sites. And they're using the robots in a certain way. They're using them to move supplies and specimens back and forth and keeping the caregiver in front of the patient so that the patient then sees, okay, the robot's taking some of the stuff that's making me feel uncomfortable away, but the person, that human interaction, remains. That's so important as we look ahead.

Elizabeth Sukkar: And finally, Don, what are your thoughts on the workforce planning for a digital future? And I think we'll end with that last question.

Don Woodlock: Sure, I'll reflect what a few have already said. I think we need software and data to work for the clinicians, not vice versa. And I'm certain it seemed the other way around in the early days. Trying to get the data into the system so bills could go out or what have you. And we need to really turn that equation around and have the software and the data and the decisions really help clinicians make better decisions and have a better experience taking care of their patients. But the other thing I would say is that COVID has taught us that healthcare has the best workforce in the world. Things that we thought would take a year, took a month. Things that we thought would take a couple months, took a week. We really condensed everything. Opening up new hospitals in two weeks, some of the stats you mentioned Kristin around virtual care. We turned healthcare on its head to fight this pandemic. We could do it because of the adaptability of the workforce and because we had a sense
of urgency and a clear mission and those sorts of things. The challenge for us as leaders is to keep establishing those clear missions, that sense of urgency, because when we have that, and when we have tools that are helping, then our workforce can adapt and can learn quickly. We’ve seen it in spades over the last year.

**Elizabeth Sukkar:** That is a very positive note to end on. Thank you very much, Don. I really do believe in adaptability and I think that’s going to happen. You have been a great panel; I’ve learned a lot today and thank you out there for listening to this webinar. Thank you very much.