

# Is the GDPR Already Obsolete?

It's here and we have to comply, but are regulations like the GDPR scalable given the pace of change and level of complexity in the world today?

**Michelle Dennedy:** The world's most ambitious and far-reaching data privacy regulation continues to create waves. Since last May 2018, when the EU's General Data Protection Regulation, or GDPR, went into effect, essentially every company that does business in or with Europe has been impacted. But given the growth and complexity of things like the Internet of Things, or IoT, cloud computing, machine learning, and other technologies, is the regulation already out of touch with reality? Do we need to rethink the laws governing the use of data and customer PI?

The GDPR is here and we need to comply, but what's the longer-term outlook and how might that model be adjusted? Well, one of my favorite people, I'm a big fan girl of this gentleman. There may be no one better qualified to assess all this than my next guest, Christopher Millard.

Cybersecurity, data protection, privacy. You like to stay ahead of the curve and listen to experts who are leading the way and deriving greater value from data with a more organized approach to data privacy. You're like us, just a few deviations past the norm. You are a Privacy Sigma Rider.

Hello, hello, hello! I'm Michelle Dennedy again, chief privacy officer at Cisco, still, and your chief sigma rider guide for the day. I'm excited to be joined by someone who's done a great deal of research on data protection and the law, especially as it applies to today's evolving technologies. Christopher Millard is professor of privacy and information law at Queen Mary University of London where he heads up the Cloud Legal Project at the university's Centre for Commercial Law Studies. He's also senior counsel to the law firm Bristows. Incidentally the same firm that brought us under BCR compliance. Thank you, Bristows. Christopher has more—

**Christopher Millard:** You're most welcome.

**Michelle Dennedy:** Yeah, thank you. A happy customer. Christopher has more than 35 years of experience as a technology ... 35 years? You're only like 10. He ages backwards. In both academia and legal practice and brings some fascinating, if not sobering insight into the challenges of GDPR and similar laws all around the globe. With that, welcome, Christopher.

**Christopher Millard:** Thank you very much. I'm delighted to be with you today.

**Michelle Dennedy:** I'm so excited. One of the little-known trivia facts is at the IAPP (the International Association of Privacy Professionals, for those who are not in the know), it took us several years to convince them that cloud computing was going to be a trend that every privacy professional really needed to understand. My very first panel with Christopher was the very first panel on cloud compute for privacy people. That was a while ago.

**Christopher Millard:** Oh, yes, indeed. That was indeed some time ago.

Michelle Dennedy: It's kind of amazing now to think that we had to convince people that that was important, but so goes new technology. I want to also shamelessly have you pump your 2013 book *Cloud Computing Law*. Can you give us a little background on how you came to research cybersecurity, data protection? How did you first get introduced to cloud? Who the heck are you, Christopher?

Christopher Millard: Well, thanks indeed. So, I won't give you my entire life history, but I stumbled on—

Michelle Dennedy: It's interesting.

Christopher Millard: — technology law and data protection way back in 1982. At the time, I'd just finished a masters in criminology at the University of Toronto and I was having a blast there, to be honest. I was playing keyboards in a student rock band and I didn't want to come back to England yet. I was fortunate to get another scholarship to do a masters of law and then I had to pick a topic. So, I went off to the law library late one night thinking I'd become an entertainment lawyer and I stumbled on what was then called computer law, including data protection and kind of the rest is history.

I've never been short of new things to learn and explore and discuss with people. In the early 80s it was classic computer law and the UK had a new data protection act in '84, then we did telecoms deregulation. Then, in the 90s, the internet came along. Well, it was already around of course, but it sort of exploded into public consciousness with e-commerce also expanding rapidly. But really for the last 10 years my main focus, both as a practitioner and as an academic, has been various aspects of cloud computing and the Internet of Things and anything that's cyber-physical related to that we've done work on: machine learning, robotics, blockchain, and on and on.

The book you very kindly mentioned, *Cloud Computing Law*, which has been out a few years now actually, brings together in one place a whole bunch of our research work in relation to cloud computing including some empirical work on what really gets negotiated in cloud deals; what do you find if you look at 30 standard cloud contracts in different countries, are they actually enforceable? A whole load of stuff on how data protection rules apply in practice, as well as things like law enforcement access to data in cloud, consumer protection, etcetera.

Michelle Dennedy: I want to get into GDPR in just a second, but I think it's really the intersectionality of these trends really and how we want to compute and relate to computing. And then, I think there's always this sort of forgotten thing. The innovation is cool and interesting, but at the end of the day you've got to do a deal and talking about who is doing what and how do you write down and negotiate between parties, how do you do that deal? I think that's often forgotten in this space. Don't you think?

Christopher Millard: I agree totally. And, indeed, I suspect we'll discuss this more today, but there's a bit of a divide between privacy and data protection as theoretical, almost abstract concepts and what really happens in the real world affecting individuals, but also, as you say in terms of deals. Data is just so valuable now in economic terms. It is actually central to many major corporate deals. People don't really know how to handle it, how to value it, how to protect it, how to assess the risks. What happens when you transfer personal data from one organization to another? It's actually very complex and often these issues don't surface until a little bit too late in the deal-making process. I don't know if that's been your experience too?

- Michelle Dennedy: Absolutely. I think when ... So, we've just passed yet another consumer electronics conference and there was absolutely nothing about shared value creation on data, the privacy word was dropped once in a while, but it's almost like there's this whole shadow world going on out there. But, at the end of the day none of the plastic or silica is all that valuable. It's the data.
- Christopher Millard: Absolutely.
- Michelle Dennedy: So, let's go back to Europe a little bit. Although you're in Britain now, we won't talk about what's going on there. Who knows what—
- Christopher Millard: Truth is stranger than fiction!
- Michelle Dennedy: Oh, my land. It's way too early in the day and too late in your day to have too many cocktails over that one, but we will at some point. Let's talk about GDPR a little bit and let's stay on this value and deal-making, as well as fines. Because, I think the fines are often the thing focusing folks on downside value. What do you think about ... How is your perception now? We're almost a year out of enforcement of GDPR. How's it going?
- Christopher Millard: That's a good question, Michelle. I think it's still a bit early to say because we're getting fines, but they're mostly based on actions or enforcement proceedings that started before GDPR came into full effect in 2018.
- Michelle Dennedy: Much to the relief of every attorney, right? They're going, okay, wait, we can date this before.
- Christopher Millard: Well yes, but there are some new cases coming along and I think that this year we will start to see the first really big, eye-watering fines. But, I would say, as I often say to clients and to colleagues and students, don't be over-focused on the fines as the biggest risk because for large organizations the question of confidence in that organization, the question of reputational risk can sometimes eclipse the bottom line of the fine that is actually imposed for a particular breach of the law.
- And we've seen some pretty spectacular fluctuations, for example, in the stock value of some of the big US tech companies as they go through the sort of rollercoaster of revelations about particular data-handling practices as they start to get hauled up before regulators and legislators to explain what they're doing. And these things can actually have a bottom-line impact that is greater than the maximum potential fines. I should say, the fines, themselves, can be quite big. We're looking at up to 4 percent of global revenues, not profits, revenues, which is a big deal for multibillion-dollar organizations.
- Michelle Dennedy: Yeah, it's huge. I've been following ever since California imposed the requirement of informing consumers in particular when certain types of data were lost. These breach reporting laws have certainly spurred a multitrillion dollar industry in security, but if you follow the stock prices they will typically dip for a little bit and they'll lose that paper value, and then they'll pop back up and be relatively stabilized. And so, I have a question for you. None of this is on anything that we talked about beforehand, so you can defer or tell me I'm crazy. That's totally cool with me, which isn't unexpected for me.

When I'm looking at stock price I'm looking at a couple things and I'm thinking one, there's sort of the factor of dumb luck. So, TJ Max or TJX, the company name, that fell right before the last recession. It seems to me like, A, it was an external party that attacked them, B, we were in the beginning of a big recession and what do they sell? Cheap stuff. So, the fact that people continued to go to those stores and buy cheap stuff, their stock price dipped dramatically and then went right back up. And we've seen the same thing with Sony and some of these other things with time.

My question to you is something I've been noodling in my head. When I look at the composition of those boards and the types of the people who are investing in and doing particularly robo-trading in public markets. There are no security people on those boards. There are no chief privacy officers sitting on the boards of Sony, Target, name a breach, I do not see chief privacy officers sitting on those public boards. So, are there people asking the question in the market for buying and selling stock? That's question number one. And, do you think if that premise is true, what if we had more expertise on data and data markets and deal-making in data sitting on those boards that are governing companies and those that are investing in trading in companies? What are your thoughts?

Christopher Millard: That's a very interesting couple of questions. I think just to respond to your comment about the share price, the stock prices dipping and recovering, that's absolutely true and that's true for some of the very biggest players that have been hit by, let's just say, a lot of public scrutiny. But, I think that even if the stock price substantially recovers, the regulators and legislators won't forget what they've seen, often on primetime television, and it's possible that as people begin to realize that the core value in so many businesses is data, indeed, not just data, but often specifically personal data, then that history and those headline reports, even if the stock prices have bounced back from the depression following an investigation or a fine, I think those things can live on for quite a long time. In terms of the expertise on boards point, you must know more about this in some ways than me, but my perception is that it's changing and GDPR, funnily enough, as much though I criticize it in many detailed points, has been a catalyst for getting businesses to take privacy and data protection seriously as a core business issue and a core governance issue.

We are starting to see individuals, whether their title is in information or data or security or technology, having a much higher profile within large organizations. And, in some cases, that means they are getting a seat on the main board or at the very least they are being consulted frequently and listened to much more carefully than they would have been in the past.

Michelle Dennedy: I think I'm seeing that trend start to occur too. We've certainly invested a lot of time and effort getting GDPR-ready and we the industry, we the globe, not just we the company I currently work for, but I think you're absolutely right. In unearthing this data and these data assets, and the way we're doing business, are we getting into cloud? Are we looking at a public ledger to permanently record certain artifacts of our data in blockchain or other types of technology? I think as we're looking at how we move forward to grow our business, to change our workforce, to meet the new changing workforce where they are, we're looking at data as a reputational risk, but also hopefully as an asset.

Christopher Millard: Absolutely.

- Michelle Dennedy: I want to pick up on something that you said. That although it has some benefits and some influences, what's the deal with GDPR, Christopher? What are some of its failings, if you will, or some of its challenges? I hate to say failings. I don't want to hurt its feelings.
- Christopher Millard: I think you could use either word, actually. I've been struggling with how you apply this stuff in practice from well before GDPR. Indeed, in the '80s the early laws, well they started in the '70s, but the early laws were very high-level principle-statement-type laws. And then, when the data protection directive came along, it appeared first as a draft in 1990, it was adopted in '95, was supposed to be implemented in '98, but didn't really get around to be implemented in a lot of countries until 2000. That was a 10-year process already. That was more detailed, a little bit more granular, but the GDPR is a complete step-change in terms of complexity.
- So, on the one side it has still these very high-level principles, which are now in Europe human rights principles. They're embedded in our Charter of Fundamental Rights of the EU. So, data protection is a human right. That really is as high level as you can get.
- And then on the other side, as you well know, when you dig into the weeds of GDPR, you find all this incredibly bureaucratic and complicated record-keeping stuff and trying to assess whether or not you have to notify a regulator at a particular point, not just for a data breach, but because you want to engage in what might be considered risky processing because it's something new using IoT or machine learning or blockchain or robotics or whatever. It's become a whole industry and tens of thousands of jobs are being created around the world because of GDPR.
- It's highly rules based, extremely granular, and, as I say, very bureaucratic and very labor intensive. I think that's difficult because on the one hand we're trying to get people to take privacy and data protection seriously as individual rights issues, but then they just encounter this wall of stuff they have to manage to attempt to be even reasonably compliant with rule sets like GDPR.
- Michelle Dennedy: Yeah, it's kind of overwhelming. It's interesting because there's this sort of Asimovian fear of, the robots are coming, all of our jobs, and yet you're absolutely right, tens of thousands of jobs have been created just meeting the large number of requirements that have to be met before you even launch a service into the marketplace.
- Christopher Millard: Yes. I think the other complication around this is the urge to regulate technology, which has been around in the UK for at least 150 years. We had a thing called the UK Locomotive Act of 1865, which set a speed limit for locomotives including automobiles of two miles an hour in cities and the absolutely crazy four miles an hour out in the countryside.
- Michelle Dennedy: Woo, four miles an hour? Christopher, slow down.
- Christopher Millard: You better believe it. This is pre-Tesla. And a guy carrying a red flag had to walk in front of the vehicles. Now if you fast forward to today, in fact throughout my career of nearly 37 years now as a technology lawyer, it's frequently stated that there ought to be a law against a new technology or at the very least it ought to be heavily regulated. Maybe we should even have a new regulator. This keeps coming up. And lately, the hype has been around AI, which is a widely misused term, but we don't have time to get into that today, particularly narrow AI—

Michelle Dennedy: We can talk about that being a misused term because I'd go to battle on that one. I like that.

Christopher Millard: Yeah, so, I mean it's a great thing for the press because they can get out their Terminator pictures and everything else and the robots are coming, they're going to take our jobs, they're going to kill us, whatever, which is a load of hype on the whole. It doesn't mean there aren't real issues in there, but they're much more nuanced, and much more challenging, when it comes to using things like machine-learning technologies, techniques, and processes to change the way that we learn about connections between things, how to improve processes.

Obviously, all of these technologies can be used in beneficial, but also potentially harmful ways. But, it's just too much to explain all of that in a short piece in a popular newspaper. So, what we get is this sort of binary polarization where either AI is going to solve all the problems that we've ever had or it's going to kill us all. Clearly, neither of those is necessarily true.

Michelle Dennedy: It's true. It's amazing, and my producer is going to roll her eyes at me really quickly on this one, but when you think about ... I don't know if it's the third page QD or the five page QD, we're going to take a whole page looking at boobs. Boobs are ancient, but we won't take two columns to talk about what actually is AI, what actually is the risk.

Christopher Millard: Indeed.

Michelle Dennedy: This is sexy technology.

Christopher Millard: Well, indeed. And one of the things that I wanted to mention, actually, is the frequent calls we hear now for don't trust the robots, don't trust the machines, make sure there's always a human in the loop who can be fair and reasonable and objective and empathic, and all these other things humans are supposed to be. Now, actually, if you look at the research, humans don't have such a great track record when it comes to being consistent and fair and objective, and so on.

Michelle Dennedy: Anyone who's ever been married knows this for sure, Christopher.

Christopher Millard: I'm not going to go there. There are plenty of studies - for example, one of the ones that is often cited involves Israeli judges in parole board hearings. Somebody took a very large data set and they tried to control for all the variables. What was the offense? What was the sentence? What was the ... all the probation reports. All that stuff. And it turned out the only statistically significant factor was how long is it since the judge or judges had breakfast or lunch. So, it becomes a sort of biorhythm, bio-break question.

That may sound very human. You know, robots don't actually need exactly the same bio-breaks as you would. We flatter ourselves a bit too much, I think, as humans. Another example I suppose is in terms of preselecting candidates for hiring processes and even, in fact, in terms of assessing school children. So, there's a big study from Florida which showed that when school teachers were tasked with identifying gifted students for a fast track, the white students did twice as well as the Hispanic students. Once they got a computer involved and they went into an algorithmic process, it turns out the scores of the Hispanic students tripled.

Now, I'm not criticizing these school teachers. I'm not suggesting they were deliberately unfair. A lot of these biases in humans are unconscious. We don't know we have them. So, my push-back to the GDPR, which has, as you know, a very specific provision that says you have a right to request a review by a human of a decision made by a machine that significantly affects you, my riposte to that would be, well what if we could get to the point where, in particular contexts at least, there's a ton of data that shows that machines are likely to be more objective, more consistent, fairer than humans, I'd like to appeal to a robot against a decision made by a human.

Michelle Dennedy: Yeah. I think it should kind of go both ways. I feel like ... We could get into a whole other thing and I'd love to if we can schedule. It's hard. I've been chasing Christopher like a shameless fan girl for almost a year now. I would like to come back and talk about just this topic on ethics and kind of both ways. Because, just like you have to bring a snack to your parole hearing, you have to make sure that the coders that are coding these algorithms they are bringing human sensibilities and biases to the table as well. So, maybe it's a case where you have to have some human decision-making, some robo, and then maybe crosscheck each other. I'm not sure.

Christopher Millard: I agree, and I'd love to talk further about that because you pushed another button for me there by mentioning ethics, which is a hot topic in the last 12 months at international conferences of privacy regulators and all over the place.

Michelle Dennedy: Well, you and I need to talk about that one in general.

Christopher Millard: But we didn't because nobody stops to say what they mean when they use this word ethics.

Michelle Dennedy: Yes, that's what I was going to say. People mean it like, do good. That's not what ethics is. It's a thing—

Christopher Millard: Well, it could be, but it could be any number of other things. You can go back two-and-a-half, 3000 years and look at different foundations for ethical theories. People just throw this word into the mix as though, well we all know what that means. We all know what it means to be fair and not to be harmful and to be good, when it isn't that simple actually. Are you a utilitarian? Are you trying to appeal to some absolute values? Some external objective values? What are you basing this on?

And, I find that a lot of debates in the privacy space, as soon as people start appealing to ethics, they kind of stop hearing each other or understanding each other because they are almost operating at a level of fundamentalism where they just have such different world views that they haven't articulated, perhaps even to themselves. So, there's no real scope for making proper progress in those discussions. So, I'd love to come back to that.

Michelle Dennedy: Let's do that. Actually, tonight I am starting my class at Stanford. There's a night school program on ethics. I've been reading and reading and reading, but realizing I need to talk to real ethicists to really get my arms around east versus west, utilitarian, harm-based, fundamentalism. Are we Kant or are we Hobbes? Unfortunately, based on our timing, we *can't* go on, Christopher.

Christopher Millard: Ho, ho, ho, ho.



- Michelle Dennedy: Shameless, shameless. A philosopher's dilemma. Just to wrap up, let's give your summary in thinking about this GDPR model. What do companies do about GDPR versus technology? In two minutes or less.
- Christopher Millard: Wow, that's a tough one. I was hoping you'd ask me a different question, actually.
- Michelle Dennedy: Ooh, what's the question you wanted to be asked?
- Christopher Millard: Well, a more fundamental rethinking of the whole model. Do we need a kind of paradigm shift when it comes to very complex systems with masses of data? So, IoT, whether you think it's 20 billion or 50 billion or a trillion connected devices, mediated via multiple clouds. The idea that we have to use these transparency rules, give everybody notices, and then we have to get some way of recording the legal basis for the processing, whether it's consent or contract or something else, is not scalable. Indeed, it hasn't been scalable for a long time. But, it's starting to look ridiculous in very large cyber-physical systems or ecosystems.
- I think we need to go back to first principles. Even though GDPR some people think has only just landed, actually it may already in some respects be obsolete. I think we need to look at the objectives again. Is this about making sure the fundamental human right to say privacy or data protection trumps everything? Oh, actually I don't use that word anymore, sorry.
- Michelle Dennedy: Yes, thank you.
- Christopher Millard: Or is it actually a bit more pragmatic than that? So, actually there are significant public benefits here in terms of using personal data for healthcare research, using it for public security purposes, et cetera. And, should we be looking at some kind of balancing of potential harms, of risk? I think GDPR does have a lot more risk assessments and risk balancing than we had previously in the EU, but I think that the Europeans can learn a lot from what's being done in the US. And, of course, I'm a huge fan of your *Privacy Engineer's Manifesto* book—
- Michelle Dennedy: Woo-hoo!
- Christopher Millard: —which I'm sure people can go off and buy straight away online after this podcast. But, you know, this gets very nitty-gritty and very practical. I don't want to lose sight of the underlying principles, the ethical principles indeed, which I do think are very important, but I don't want to get stuck with this complicated bureaucratic edifice really, which GDPR has become, to the point that people don't know what is the right thing to do and they can't actually implement it in practice.
- In terms of scalability, just a quick word on that. If we've got hundreds of billions of connected things, then the idea of individual contracts, notices, etcetera, is not going to work. There are other models, though. For example, there's the consumer protection model. There's the safety model. There are various insurance models. One of my favorites is actually the New Zealand model where they abolished pretty much tort law, which I guess your US listeners, at least the lawyers will be very upset about.
- Michelle Dennedy: They're going, what?



- Christopher Millard: They have got this central state-backed compensation scheme. If you have any kind of accident and it could be in a car, it could be in a hospital in surgery, it could be some piece of technology that malfunctions, you are compensated. It takes out of this all of the question of the causation chain, proving who shouldn't be able to pass the buck any further down the chain to the next person, and so on. And that is a radical alternative that is not going to be popular in the US, with lawyers at least, but it's the sort of thing we need to start talking about because we cannot scale in an effective and fair way the one-to-one type privacy compliance and contract enforcement for liability and tort enforcement models that we have at the moment.
- Michelle Dennedy: I could not agree with you more, Christopher. This is why I always love talking to you, because I think until you do get back to first principles and you continue to question, even as you comply, you know we're all hands to the air, we're complying, but I think we do have to continually pick the best of each model, watch it in motion, look at it as a data story if you're an agile developer, a use case-scenario-type person or even just a beta. And look at all of our experience to date, and say what's working? What's not? And then what has changed vastly and completely and indelibly in the environment? We're actually not going just two miles an hour anymore.
- Christopher Millard: Indeed. And we've got to do it in a collaborative, interdisciplinary way.
- Michelle Dennedy: Absolutely.
- Christopher Millard: The lawyers can't do it alone. The computer scientists, the engineers, they can't do it alone. The designers, the regulators. Many people operate in bubbles on privacy like they do in so many other things these days and we've got to break down those boundaries. We're not going to solve these problems on our own.
- Michelle Dennedy: That's right. Well, Christopher, I'm getting people hand-waving from the booth. We have to cut off for this session, but please come back for another ride on ethics.
- Christopher Millard: I'd be delighted to do that, Michelle, and it's been a pleasure talking to you today. I'm glad we finally managed to do this.
- Michelle Dennedy: Yay! I'm so glad. And thank you for your grace. The last time we were supposed to record I think I had a tooth taken out and it was dreadful. You're much better than pulling teeth.
- Christopher Millard: Well, I guess I should take that as a compliment.
- Michelle Dennedy: Absolutely. My takeaways from Mr. Millard today ... Oh, and by the way, Christopher, I've secured tickets to the May Ball in Cambridge this year, so I may be knocking on your door to come by and give me a turn on the dance floor.
- Christopher Millard: Please do come visit us, absolutely.
- Michelle Dennedy: I shall, I shall. So, my takeaway from today, closing remarks with the wonderful, extraordinary, and a little incendiary Christopher Millard. Those Brits, they're quiet, but they bring a big stick. A, bring a snack to your next parole hearing and tech is sexy. It's a wrap for the Riders. Thank you very much, Mr. Millard.

Christopher Millard: Thank you very much, Michelle.

Michelle Dennedy: You've been listening to Privacy Sigma Riders, brought to you by the Cisco Security and Trust Organization. Special thanks to Kory Westerhold for our original theme music. Our producers are Susan Borton and David Ball. A special shout-out and thank you to our Cisco TV production partners. You can find all our episodes on the Cisco Trust Center at [cisco.com/go/riders](https://cisco.com/go/riders) or subscribe wherever you listen to podcasts. And please take a moment to review and rate us on iTunes. To stay ahead of the curve between episodes, consider following us on Facebook, LinkedIn, and Twitter. And you can find me, Michelle Dennedy, on Twitter @mdennedy. Until next time!