

Interview with Peter Scoblic

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[Dr. Peter Scoblic](#) is a co-founder and principal of the strategic foresight consultancy [Event Horizon Strategies](#).

A former executive editor at *The New Republic* and *Foreign Policy* who has written on foresight for publications including the *New York Times*, *The Washington Post*, *Science*, and *Harvard Business Review*, he's also a senior fellow with the International Security Program at New America, and an instructor for the Professional Development Program at Harvard University. Previously, he was deputy staff director of the Senate Committee on Foreign Relations, where he worked on approval of the New START agreement and was the chief foreign policy speechwriter for Chairman John Kerry.

In October 2020, on the eve of a particularly fraught election and a turbulent moment in US political history, Peter joined me for a discussion about his career, ranging from post-Cold War nuclear arms policy to the relationship between policymaking and pop culture, plus the practical question of how and to what extent we can usefully predict the future.

I began by asking Peter if he'd always been ambitious to work in foreign policy.

Foreign policy is something I've always been interested in, especially national security work, and particularly nuclear weapons work. There's been a wonky streak running through me over the years, often focussed on these dark existential issues.

It goes back to being a child of the 80s; I believe the second movie I ever saw was *War Games*, starring Matthew Broderick, in which a teen hacks into the computers of NORAD, the aerospace defence command. I was probably too young to see it and the experience, combined with the actual headlines of that decade, planted a seed which I was able to explore as a student at Brown.

My undergraduate thesis was on nuclear proliferation, and my second job out of college was editing a small journal, *Arms Control Today*, which focussed on weapons of mass destruction. Years later, I wound up writing a book on nuclear strategy and the impact of US conservatism on nuclear policy during the Cold War and the Bush 43 years, which presented something of a mystery for me.

War Games even has a climax where the military computer is running scenarios for thermonuclear war on its screens.

I spent decades studying the topic and my conclusion came down to what the movie encapsulated in a single line: “The only winning move is not to play.”

It’s a strange feeling to realise that you’d had the insight given to you at the age of nine, and you just had to take a very digressive path to confirm it in the real world.

It feels like that era of the two superpowers bristling at each other has gone, and yet, when Trump fell ill, [there was all this panicked social media chatter about “doomsday planes” taking flight](#), which made it seem as if the fears were only waiting to be roused once more.

To what extent are we still living in a Cold War world, or the shell of that Cold War structure?

It never fully went away, and at the moment it’s re-emerging in some frightening ways. When the Cold War ended, most people put the threat represented by those weapons out of their mind, and there was significant progress made in stabilising the relationships between the nations with the largest nuclear arsenals. Good work was done in reducing those arsenals, but the problem of nuclear proliferation grew, and the fact remains that the US and Russia still have thousands of warheads ready to use at a moment’s notice.

During the Cold War, we almost stumbled our way into nuclear war on several occasions. The degree of misperception about other actors’ intentions which allowed that to happen still exists today between, for example, the US and North Korea.

Ernest Moniz and Sam Nunn [have argued](#) this is actually the most dangerous nuclear time since the Cuban Missile Crisis. That’s debatable, but certainly these structures and tensions are still with us.

The popular narrative in the 90s and 2000s was no longer about the nuclear opponent who was the West’s mirror, but it was about the dirty bomb, the stolen warheads, base commanders gone rogue. Matthew Broderick in *War Games* was switched for George Clooney and Nicole Kidman in *The Peacemaker*, or even John Travolta as the rogue military man in *Broken Arrow*.

It seems as if the “rules of the game” for nuclear war were perceived as fairly stable from the Sixties through to the early Nineties, and then things got messy after the Soviet break-up. Did scenarios become less important when the old rules broke down, or did they remain useful in this more fragmented situation?

Scenarios, at least in the United States, grew out of the Cold War dynamic and especially the work of the nuclear strategist Herman Kahn. He challenged people to think the unthinkable precisely because they seemed to believe that either deterrence was stable enough, or the consequences of deterrence failing were so horrific that they shouldn’t even be contemplated.

Kahn was very provocative and even gleeful in pushing people to look at these things they didn't want to, which is one of the reasons he became the model for Doctor Strangelove.

Scenarios became crucial to keeping nuclear threats on the radar of policymakers and the public in the post-Cold War period. The nature of the threat could change, and we saw this played out, not just in policy circles but also in Hollywood. People assume that if Hollywood tells these stories, it can't be real - but a lot of these Hollywood stories were quite plausible in their general thrust, if not the specific details.

A great example of this is Jeffrey Lewis' *The 2020 Commission Report on the North Korean Nuclear Attacks Against the United States*, a novel which explores a fictional escalation of tensions between the US and North Korea. It's essentially an extended scenario showing how perception and misperception can still lead to nuclear conflict.

Hollywood becomes a place where we can have this conversation at a public level, and after all, Kahn took the term scenarios from the movie industry, where it means the detailed outline of a proposed feature film.

Did Kahn himself have a moment of revelation, when he hit on the scenario as a tool for strategic foresight?

This question fascinates me, but I've been unable to nail down an answer. I've corresponded with Sharon Ghamari-Tabrizi, the author of [Kahn's one mainstream biography](#), but we've not been able to pinpoint a single precise moment when he comes up with what he called these "strange aids to thought".

Kahn helped strategists to work with stories instead of calculations when projecting the future. Ghamari-Tabrizi calls him "the only nuclear strategist in America who might have made a living as a standup comedian"!

To what extent, as a foreign policy expert, were you being trained in narrative or quantitative approaches to the issues you were dealing with?

My experience fell into an unsatisfying middle ground of neither: theory without empirical data to back it up. This is what forms the uncertainty in this area of policy; although nuclear weapons have been used, no-one has ever fought a nuclear war before. Notions of deterrence and what will work, or won't, end up being theoretical, and people sometimes accuse nuclear strategists and nuclear arms control professionals as working in the realm of theology, where we're articulating policies based on faith rather than empirics.

That's not entirely fair, because there is an increasing historical record, and declassification helps us to piece together more of the story behind the Cold War. However, I wasn't raised with either a quantitative or narrative view of the problems I sought to understand.

I heard a similar comment from the venerable scenario editor Betty Sue Flowers, who said that economics was also theological, because ultimately there were assumptions you simply weren't allowed to question.

People may debate that, but is there an element of truth to that when it comes to nuclear arms control? Are there certain premises you have to accept for the policies to make sense?

There are, and the problem is that the arguments are not resolvable. One can build very precise, ornate, logical arguments for or against the effectiveness and stability of deterrence, for example, but if you track the debate over the decades, it hasn't advanced very much in some ways, because you can't put the arguments to the ultimate test.

At some point, the arguments become so routine and well-worn that a former colleague of mine suggested that at conferences, we should be issued with numbered paddles representing the standard set of arguments. Instead of spending time re-litigating each one, we could just raise the appropriate paddle.

You wrote in the *Washington Post* in 2016 that Donald Trump's presidential candidacy was one that "we didn't see coming, but could have". You also spoke of that election as one that raised a "metaphysical question", which sounds rather like your depiction of the 80s Cold War's existential threat.

Was that *Post* article a waypoint in your journey from arms control policy wonk to the strategic foresight practitioner you are today?

The jump to foresight was a break which came about as a result of my interest in forecasting. I read Philip Tetlock's remarkable book *Expert Political Judgment*, built on a twenty-year study of expert predictions of political and economic events. One of his findings was that expertise in a given field doesn't actually offer a tremendous predictive advantage, but what really interested me was his discovery that some people were genuinely better than others at foretelling what came next.

That finding was the basis for a project funded by the US Intelligence Community which ultimately led to his book *Superforecasting*, in which he uses a mix of talent-spotting and training to bring together a cadre of people who are well-calibrated forecasters of the future.

The idea that you could predict, not with certainty but at a probabilistic level, the future of a complex domain like politics just blew my mind - it struck me as magic. I was an editor for *The New Republic* and *Foreign Policy* for many years, and one of the great things about that role is that whenever you find someone who has a cool idea, you can just pick up the phone and ask them to write something. I did that with Phil Tetlock, and he wrote a piece examining the CIA's Global Trends reports, which explore the future twenty years out.

That conversation sent me back to graduate school, and when I got there, I realised that Phil's work was about transmuting uncertainty into risk, finding ways to assign probabilities to mysterious future events - but I was also interested in the chunk of uncertainty that still remained after that process. What do you do with that?

There's a joke in US doctoral programmes that "all research is me-search", and we study what we don't understand in our own lives. I started grad school at a point of enormous uncertainty in my life, both personally and professionally, and so the topic became a fixation for me. How do we think of future uncertainty in productive and constructive ways?

Did you have a first encounter with a particular foresight school or method?

At Harvard Business School I tried to find faculty members who were interested in studying how people think about the future. My adviser, the brilliant Amy Edmondson, was incredibly supportive, but many others looked at me like I'd just sprouted a second head! It made me question whether this was an academic question, or a business school question, at all.

I remember sitting down with the head of the strategy unit, Dennis Yao, who was very gracious and insightful, and asking who was looking into the ways we understand the long-term future, and formulate strategy around that. He told me that the strategy discipline doesn't really deal well with dynamic change on that scale.

For a while, I was casting about blindly, but I then had a conversation with the futurist Brian David Johnson, who connected me with communities of foresight practitioners in both business and government. It wasn't so much that I found a school of thought, as a group of like minds who had banded together for lack of institutional support, so that they might trade ideas.

Foresight, as a practice, seems to somehow be something that is "always already emerging". It's been around for a long time, but it remains something like fringe theatre - only pulled into the mainstream when it's useful. Like in turbulent years such as this!

Your doctoral research has led to a number of outputs, including [a great research paper on strategic foresight as a dynamic capability in uncertain situations](#), and case study work on the US Coast Guard's scenarios programme which can be explored in both [an article](#) and [podcast](#) for the *Harvard Business Review*.

Is there anything you uncovered in your doctoral research which hasn't come up in coverage of your work?

Scenario planning can be used to challenge assumptions and the mental models people have of the world, but it also has its own models and assumptions baked into it: how time works, how the future relates to the present and past.

One of the things I found interesting was that, among the Coast Guard for example, scenario participants found that the process didn't just change their mental model of how the organization went about its mission and operations; it also changed the way they thought about time.

Scenario planning communicated its epistemological and ontological assumptions implicitly to participants. They absorbed it without realising they'd done so, finding that it hadn't just changed what they thought about their organization's strategy for the future, but also how they thought about questions of strategy and the future.

Something similar comes up with students of history. I researched the lives of scholars who were refugees from the Nazis for my doctorate. There seemed to be some evidence that German and Austrian refugee historians developed an unusually sophisticated perspective on time, using their historical research and writings to encode concerns and issues they had about the present.

Bill Schwarz's 2004 essay "[Not Even Past Yet](#)" points to Caribbean migrant intellectuals in the UK also developing "an unusually complex consciousness of the shape of the historical past" as their writings spoke both to the distant past and the tensions of the present.

Recently, I've been wondering about the ways in which scenario planning is analogous to therapy, including the fact that both scenarios and "the talking cure" are a kind of change process that we don't fully understand, even though they seem to get results.

Do you think scenarios have been used therapeutically within the policy establishment?

One would have to identify the pathology! There's probably no shortage of those, however - including short-termism, which afflicts a lot of policymaking.

In that sense, one could view scenarios as having been a therapeutic process for the Coast Guard, which reoriented the organization toward the longer-term future. It did this not only by explicitly asking them to consider what lay twenty years ahead of them, but by inculcating this sense that doing so was important, worthwhile, constructive, and useful.

Do you think there are things we have to be cautious of, if we import that mental model?

Any discipline or methodology can transmit an orthodoxy, and you have to be careful. The ability to question is essential to both scholarship in general and this question of thinking about the future.

There is sometimes a sense that scenario planning is a corrective to a quantitative, forecasting approach to thinking about the future - the hubristic idea, born in the 1950s, that the future can be known, if we only model it carefully enough.

Scenario planners and foresight practitioners sometimes commit the same sin in the opposite direction, saying “the future is wide open and we can imagine anything”, as if there were no constraints on reality, nothing could be known about the future, and anyone who thinks tomorrow is something other than a *tabula rasa* is just plain wrong.

Philip Tetlock talks about beliefs as testable hypotheses, not sacred truths; I think it's important for us to remember this when we reflect on methods of forecasting and foresight.

There's also an element of practicality. How far do we choose to question everything that's presented to us?

If we try to question everything, we run up against the limits of bounded rationality very quickly. There's too much information, and there are too many possibilities, so heuristics are necessary for us to cope with the world.

You manage to bridge the worlds of both foresight and forecasting: those who imagine the future and those who seek to predict it. But by embracing forecasting, do you inevitably have to opt for a deterministic worldview in which the future can ultimately be known and calculated?

Taken to an extreme, you find yourself with LaPlace's demon - the idea that if some supernatural entity knew the location and momentum of every atom in the universe, they could play out the future with all the certainty of classical mechanics.

It's not a comfortable place to be, and one of the economist Frank Knight's responses was that no matter how much we detest uncertainty, we would be bereft without it: uncertainty allows for opportunity, entrepreneurship, and free will. In Knight's conception, uncertainty about the future was what allowed for different conceptions about what awaits, which in turn allows for competitive choices and profit.

Probabilistic forecasting elides this problem precisely by virtue of its focus on probabilities. It doesn't yield the predictable certainties you'd find in a Newtonian universe, with people bouncing around like billiard balls. It attends instead to the complexities of human interaction.

I keep returning to [Jerry Ravetz's comment](#) that after Descartes discarded the humanities in favour of geometry, “Many practitioners who nowadays receive emotional security from the belief that their spreadsheet will tell them precisely what to do with a project or company are living with the consequences of Descartes' desperate grab for certainty.”

It's easy to be seduced by the certainty of numbers, but stories have their own seductions too. How do you deal with that tension between those who want the confidence of numbers, those who find more benefit in stories, and the risk of being led astray by overemphasising either?

The first step is awareness. Among scenario planners, there's great recognition that numbers can suggest a false sense of precision and that certainty can be seductive. When you put a 72% probability on a future event, does that have meaning, or is it merely a simulacrum of meaning?

However, it's also crucial to acknowledge that stories can have the same seductive power. When we craft a scenario, especially when we use that imagined future to reflect on the present, it's important that we don't start confirming our imaginings by blithely seeing evidence of that scenario in everything that's around us. Though we tell ourselves that scenarios are not predictive, we nevertheless may adopt them as what psychologists call a focal hypothesis and then start seeking out evidence to confirm them. You have to be constantly on your guard against that. One particularly good story does not a probable future make.

Holding two ideas in your head at the same time is a challenging thing for anyone, but it's a skill worth cultivating, especially when we're approaching uncertainty.

It's like being Zorro, riding with one foot on each horse. Or perhaps the White Queen, believing six impossible things before breakfast.

You collaborate and co-write with Philip Tetlock. What's the dynamic of that back-and-forth between a foresight practitioner and a forecaster?

I feel very fortunate to have the opportunity to collaborate with Phil, whose scholarship has had such an influence on me. It works well because we each bring different perspectives to the table. It's not that we're at opposite poles, but we come at the problem of uncertainty from two different angles. We've learned to constructively disagree! I also think we have complementary skills.

Phil is a great proponent of adversarial collaboration; that doesn't quite describe our relationship, but helps explain how we work together despite having different views on certain things. It helps that we can have collegial disagreements about things and that, at the end of the day, we're both pragmatists; while we will indulge philosophical debates, we're also asking: "How can people make better policy?" The most constructive thing under those circumstances is to, at some point, lay aside ontological debates about the future and ensure that our work helps improve decision-making.

How has the collaboration shifted your thinking?

Previously, I'd worked in opinion journalism, in which one can sometimes be very convinced of one's own righteousness. Working with Phil has more deeply internalised my sense that one's beliefs should be treated and defined as testable hypotheses. That's not to scientise our values, but no matter how open-minded we think we are, we still carry around a set of mental models which we must be willing to test if we want to get closer to the truth.

I guess science is ultimately about the commitment to revise your beliefs in the face of evidence - at which point it then becomes a discussion about what standards of evidence you accept.

Polemic has its value in order to shift people's thinking, even though it's very different from those testable hypotheses, or the academic work you've been doing lately. Do you find you still value both?

Polemic does have a place, and especially these days, there's a time for outrage and a time for incredible strength of opinion. At one point, Phil and I had an exchange where he thought I was being alarmist, and I thought he was being complacent; the fact that we were able to find a way forward perhaps illustrates the strengths of our collaboration.

To frame beliefs as testable things, one needn't trade objectivity for neutrality. You don't have to be completely agnostic about everything. It's a very different way of approaching the world, but I've come to value both deeply.

Like embracing both numeracy and narrative, or the Zorro-on-two-horses approach of combining forecasting and foresight, it is possible to value polemic while at the same time wishing to put "sacred truths" to the test.

If you think of them as lenses, being able to apply both will give us a clearer view of the truth, to the extent that that's an establishable thing. Truth is a squirmy beast!

That metaphor of the lens is very useful. The Oxford Scenario Planning Approach, of course, speaks of "strategic reframing", and at the EXBD scenarios event in Copenhagen this year, participants were given sheets of coloured cellophane representing different aspects of the future, so we could remember to look at various scenarios through the tint of a given lens.

Within different paradigms, different questions are askable, and different methods are accepted. There are times, in my research, when I've wondered if I was exploring science or scientism - not everything that is true can be established in a laboratory. It makes us humble, as we recognise the limits of what we can know, and how.

Humility is a difficult thing to cultivate, especially for people who have gained doctorates in particular ways of looking at the world, and who see themselves as engaged in the pursuit of truth - there's always a danger of hubris.

I felt lucky, as a grad student pursuing a PhD in intellectual history, to follow in the wake of a great deal of thought & writing about how we grapple with the past. Dominick LaCapra and others encouraged us, through their publications, to think of history as less like laboratory work and more like the messy public encounters of the clinic. You can't expect the past - or the future - to behave as if it were under lab conditions.

Sometimes I wonder if scenarios are about the future at all. Josh Polchar at the OECD compares them to instructional fables; Pierre Wack said you spend only a little time talking about the future once you've built the scenarios, and you then focus on the implications of the present.

Scenarios use the future as a convenient fictional setting in which to craft stories that will shine light on our strategic blindspots, but in some ways they might as well be set in parallel worlds.

Scenarios are essentially the crafting of fake analogies, what Kahn called "ersatz experience", so that when we encounter the novel or unexpected, we have something to compare it to, instead of flailing about in the moment.

Fiction needn't be set in the future to convey experiences and situations that we haven't had - or cannot have. Some fiction challenges us to consider: how would we respond in the situation faced by these characters? What if I found myself in this story?

Scenarios aren't simply their own bubble universe, belonging only to specialist practitioners. We're all engaged in scenario-making at various points in our lives.

The information architect Peter Morville, in his book *Planning for Everything*, talks about choosing between three job offers in three different towns: you imagine what the daily commute would be like, what it would be like to be in that office each day with those co-workers, what kind of work would occupy your time, where your kids would go to school, and so on.

This is also proto-scenario-planning, as is Rafael Ramírez & Jerome Ravetz's idea that when we buy a house, although it's a major investment, the decision is also based as much on gut feeling, emotions, and a sense of the stories we can imagine ourselves living out there. Scenarios of home ownership influence the biggest financial decisions of our lives.

Sticking with this question of fiction, I know you're a fan of Charles Stross. Even though his novels are set in a wildly different universe to our own, with cosmic horrors and weird science, they're also very much about the travails of middle management and office life in today's society.

Does that kind of reading also feed your work?

I started reading Stross' work at a time when I was very much trying to escape reality. I picked up the first of his *Laundry Files* books, which feature spies trying to fend off Lovecraftian horrors, during a difficult period in my life, feeling pretty sure that nothing between its covers would speak to the things I was dealing with. Of course, as the series goes on, it became more and more evident that it was also speaking to issues that I had experienced, or that I was now studying. His work is like what if Lovecraft was a dissatisfied management consultant at McKinsey; funny because of the truth within its fantasy.

His work, and that of a number of other writers, have always challenged me to think more creatively and imaginatively. My natural mindset is a pretty linear, experienced-reality approach to things; it's actually very difficult for me to conjure scenarios, and I'm in awe of writers like Stross and Jeff Vandermeer. I marvel at the wonders constructed in genre fiction, sentence by sentence; those writers are constant provocateurs encouraging me to think more differently.

It reminds me of Thomas Mann: "A writer is someone for whom writing is more difficult than it is for other people." Something similar might be true of good scenario planners, who have to work assiduously at the construction of plausible futures.

I've never found writing easy, even though I've chosen to devote a substantial part of my career to it. I'm not someone who can simply crank out two thousand words a day, it's not merely a matter of discipline for me. I envy these prolific novelists!

With reference to Vandermeer, the second book in his *Annihilation* series, especially, is very much just about the trials and tribulations of running a government agency that is dealing with a complex crisis.

The juxtaposition of weird events and organisational thinking fascinates me, because it highlights the extent to which the greatest mystery is: how do we work with other people? How do we manage to organise ourselves collectively and effectively to achieve our goals in an ever-changing world, without completely descending into conflict and anarchy?

I remember looking over the city of Sydney once, with all the traffic racing along the freeways, and thinking: "Given how complex and screwed-up every human being is, how much we've all got going on individually, it's amazing that the lights go on when you flick a switch and the food gets to the supermarkets on time, and really, that any of this holds together at all."

I have a recurring thought, looking at a cityscape, and asking, "Given what I know about human society and the challenges of cooperation, and the foibles of our individual behaviour, how on earth are those buildings still standing?" And yet - we have cities.

This sense of wonder or what Keats called "negative capability" applies to strategic thinking, too. Even in probabilistic forecasting, there's still an imaginative or aesthetic

element at play, it's never strictly quantitative. The forecaster looking at a situation in the present and the ways it might play out in the future has to decide which past events it's analogous to, they have to adjust for uniqueness. There's still an element of craftsmanship there.

There's an enormous overlap between forecasting and foresight, and one of the areas of common ground is this notion of "active open-mindedness", the willingness to entertain alternative points of view.

Art, science, and craft come together in preparing a forecast, because there are not always obvious comparison classes to future events. How do you define the most useful comparison class, and then adjust it to a specific circumstance, with its particular instabilities? There's also art in knowing when you stop; when you stop adding new information, when you stop adding strokes to your painting of the future.

Good forecasters are, in some ways, just naturally better at determining where that point is. They extract the signal from the noise and then they're judicious about when they stop adding new information to the mix, where some of us mere mortals have our sense of the future sent bouncing from one headline to the next; whatever we last read in the paper shapes our notion of what we think is about to happen.

Quality control can be challenging when a new method begins to spread. One of the innovations you and Phil Tetlock suggest is to use scenarios to generate "question clusters", groups of testable hypotheses to which we can then apply predictive methods.

How do you make sure that forecasting, and your hybrid approach, stays at a gold standard?

There's certainly a danger of people doing it badly - and even worse, doing it badly and believing they've done it well. You may be a horribly calibrated forecaster, but you think you get the method, and you don't put in that long and rigorous ongoing work of ensuring that your forecasts are genuinely well calibrated.

The number of scenarios I've seen, sometimes from very prestigious and credible sources, where there are fundamental errors, reminds us that rigour and the capacity for self-critique is essential.

The same thing is true for question clusters. Many methods of looking at the future already incorporate signposts and indicators of emergence, weak or strong signals of change. There's always a danger that you're looking for the wrong thing, or attributing too much importance to something.

A historical study of US diplomatic cables sent by foreign service officers in the 70s shows that what was considered important at the time and what proved important in hindsight were often

wildly different things. Some things were obvious - the Iranian revolution was obviously a big deal! - but in other areas, their sense of priority was quite adrift from how we see their time today.

With question clusters, that means ensuring that the testable hypotheses we derive from scenarios and group together aren't just reinforcing our perceptions, that the questions aren't correlated with each other so that we aren't looking for the same thing in two different places. It also becomes important to frame the questions tightly, so that the process has rigour and we can agree on what a significant indicator of change is.

I was thinking about the advantages of this Tetlock-Scoblic hybrid approach, and then I found myself asking: what would it do to its predictive value if other players also started to employ the same approach? Would there be systemic effects, and would they strengthen or invalidate the competitive advantage people gained from using it?

That in turn got me wondering: did the Soviets use scenario planning during the Cold War? Or was that form of conversations another technological advantage held by the US? What does it do to the strategic playing field if others are also trying to use foresight and forecasting to understand your moves?

There's enormous benefit to each side in a conflict like the Cold War doing scenarios. This is a testable hypothesis, not a sacred belief, but if you create scenarios around a competitor, rival, or antagonist, and they force you to consider multiple plausible outcomes, it reduces the risk of misperception. You don't assume the other side is doing something for a single reason.

This brings us back to the question of the 1980s Cold War rivalry, which started off this conversation. The downing of the Korean airliner 007 by the Soviet Union in 1983 contributed to tensions that nearly triggered a nuclear conflict because the American assumption was that this was clearly an intentional act by the "evil empire" - how could it not be intentional? The preexisting mental model was reinforced, even though it was incorrect; a lot of factors played into the Soviet action, and their own perception of the US testing their defences played a role in their decision.

Let's draw all the threads together, because 1983 was the year of the Able Archer exercise, right?

The airliner was shot down in September, Able Archer was in November, and Reagan had given his SDI "Star Wars" speech in March. I'm somewhat obsessed with that year, as so much happened in the run-up to Able Archer, it amazes me that we got through it without a major conflict breaking out.

Right, it was the year of Grenada as well. And the tensions permeated the culture. I remember in elementary school, my mother telling me that, where we lived in the UK, if they dropped a nuclear bomb on London, the blast wouldn't kill us immediately but it

would still blow our windows out. It wasn't the Cuban-crisis era of duck-and-cover, but this was strange stuff to have in your head as a kid.

These anxieties made their way into pop culture through so many different routes. One of the strange facts I discovered was that just before Able Archer started, the band Men at Work performed their song "It's a Mistake", about accidentally triggering nuclear war, on *Saturday Night Live*. It's a sarcastic, goofy song; in the video, the war is triggered by a general stubbing his cigar out on the launch button instead of an ashtray. It's both comic and completely serious.

It seems there's no hard divide between the serious strategic stuff and pop culture. I've been wondering whether the work of the music historian George Lipsitz, who looks at artists like the Isley Brothers in terms of their historical context and the way even apparently trivial lyrics speak to the issues of their time, can also apply to the business of foresight.

In some ways, we talk about being on the lookout for weak signals of possible futures, which sometimes appear on the fringes. I wonder if artists are more attuned to the fringes, and through them things make their way into the culture which are indicative and diagnostic in some way. In hindsight we say, "Real life is stranger than fiction", but maybe art was picking up on something before it became apparent to the rest of us.

Frankie Goes To Hollywood's "Two Tribes", Ultravox's "Dancing With Tears In My Eyes" (which admittedly deals with a reactor meltdown but is still about a three-minute warning to nuclear catastrophe), Nena's "99 Luftballons"; there was a lot of this worry being rehearsed in the 80s.

You think of an image like the general's cigar stubbed into the launch button and it seems crass and satirical, but then in *The Bedford Incident*, a fairly credible drama, a nuclear weapon is fired because a nervy sailor mishears his captain's words. Where's the line between satire, foresight, and plausible depictions of catastrophe?

The tiny miscommunications and misperceptions that history's largest decisions can turn on is quite remarkable. There's certainly a place where what is true, what is funny because it's true, and what is plausible enough to consider strategically, come together.

Again I'm reminded of the description of Kahn as the nuclear strategist who could've been a stand-up comedian - who then appears, in caricature, incarnated by Peter Sellers in *Dr. Strangelove*. (And the War Room in that movie is so lovingly designed, such a techno-temple, you almost want to believe it's real).

Satire and scenarios both poke at our assumptions, undermining the stories we take for granted - and maybe helping to correct misperceptions.

Thinking of nuclear near-misses: Stanislav Petrov, the Russian officer who correctly realised that he was being given a false reading of a US nuclear attack was someone who proved able to overcome his assumptions.

He's been heralded as a man who saved the world, which he did because he was able to tell himself an alternate story on the basis of the information he was being given. He'd been trained that the signals he saw on the screen represented incoming missiles, but he was able to construct another story, which he found more plausible, and which proved to be correct: that the signals were an error, and the US was not attacking.

Sometimes it comes down to that personal level, the individual judgment call. You've been studying foresight for some time now, and you spoke earlier of how scenario work changed participants' mental models of how time worked.

Has doing this work affected your own consciousness of time, and your own decisionmaking?

We study the things that we don't understand about our own lives. I've gone through stretches of my personal life where I've found it enormously difficult to think about the long-term future. Getting involved in foresight work has provided a constant nudge: "Okay, Peter, you can do better than this. You can think about the future, about the multiple futures, and the multiple explanations for the situations you find yourself in and how they will play out."

Knowing that there are alternate paths that time may take, engaging in dialogue with imagined futures that change how you see and act in the present, hasn't just aided my decision-making, but it's changed the way that I see the world.