Announcer (00:02):
You are listening to *The Safety Moment Podcast* by Utility Safety Partners. Safety is always a good conversation and it's a click away. Here's your host, Mike Sullivan.

Mike Sullivan (00:15):
Welcome to the latest episode of *The Safety Moment Podcast*. I'm your host, Mike Sullivan, and today my guest is—well, my guest is me. It's all about me.

Today, I wanted to take some time to talk about the societal costs of damage and what that really means. There have been a number of studies over the years, and just recently something happened to me where I was a victim of societal costs. And it's one of those things like, "a funny thing happened on my way to the opera." Well, this was on my way back from a damage prevention conference.

The Global Excavation Safety Summit from *AXS Now* was held in Dallas a few weeks ago, a wonderful event. They had a fantastic programme. The calibre of speakers was phenomenal, and I find it's the right mix of content and just enough bling—and not too much bling. Some conferences get way too heavy on the bling, but the content of the programme and the speakers was excellent. It was an international conference with people there from Canada, the U.S., Australia, and other parts of the world.

(01:32):
But on the way back, it was Friday, September 18th, and I was waiting at Dallas–Fort Worth Airport for my direct flight to Calgary, which was really nice because on the way there, I could not get a direct flight. So, I was really looking forward to that. And lo and behold, I get to the airport well in advance. I didn't have a lot to do that day, and there was quite a line-up of people ready to speak to an agent. I thought, "Well, what's going on here?" There was no notice of anything, no cancellations.

About an hour or two later, I got a notice about my flight being delayed. Okay, well, it's delayed—not too bad. It's a direct flight; I can live with that. Then it was delayed again.

And then I overheard somebody talking: "Oh, there's been damage to some radar telecommunications lines. Dallas–Fort Worth and Love Field are shut down, and there are hundreds and hundreds of flights affected."

Now I'm curious. There's been no notice from American Airlines. I go stand in line with all these other people because now I realise what's going on. Sure enough, 1,800 flights were affected out of Dallas–Fort Worth and Love Field. Of those, an estimated 500 flights were cancelled.

And no sooner had I stood in line that I got a notice from American Airlines that my flight was now cancelled to Calgary and the earliest I could get home would be Sunday. Immediately, I did my best to secure a hotel because I had no idea how long I was going to be there. I wanted to book before the hotels filled up with all these people at the airport who had nowhere to go.

Once I did that, I sat down again and thought, “Maybe there's another flight, maybe another airline that I can get out of here.” I managed to get an Air Canada flight to Calgary the next morning, but I had to go to Montréal first and then to Calgary. So, it was a full day of travel.

When I finally did get on the flight to Montréal the next morning, it was delayed. So, I wasn't sure I was going to make my connection to Calgary, but thankfully I did.

These may sound like first-world problems, but the experience got me thinking about the societal cost of damage.

(04:13):
When we talk about damage to buried utilities, we immediately think of somebody being injured or somebody being killed. Unfortunately, it does happen, it absolutely does. But most of the time it doesn’t. Most of the time it’s a major inconvenience to many people when there is a buried utility that’s damaged.

This event, for me, clearly identified that. Initially, we had no idea whether it was mechanical damage, just a failure of some kind, or whether somebody had hacked into the system, which is extremely unlikely. The next day I learned that it was two fibre optic cables that were damaged. CNN and other news outlets reported it.

So I began wondering what the cost of this would be. Like many people today, I went on ChatGPT and put in the scenario: “What would it be if 1,800 flights were affected and hundreds cancelled?” I estimated roughly 500 flights cancelled. Within moments, ChatGPT began to provide me with the data. I found that its dollar value may have been somewhat conservative, which is fine, but the elements it evaluated were spot on.

For example, it identified passenger time lost. Eighteen hundred flights were affected, with twelve hundred delayed and six hundred cancelled. Roughly 235,000 passengers were impacted. The cancellations alone amounted to twenty-two million dollars, and delays added another fourteen to fifteen million, so the total passenger time lost was about thirty-seven million dollars.

Then it looked at airline operational costs. Each cancelled flight could cost between ten and thirty thousand dollars. ChatGPT assumed twenty thousand. So, six hundred cancelled flights meant twelve million dollars. It also noted that delayed flights cost between two and five thousand dollars each, estimating about 3.6 million dollars in this case.

It went further, considering missed connections, business impacts and spillovers—things like missed meetings, missed business deals, supply chain delays, rebooking, hotel accommodations, ground transportation disruptions—and estimated that figure at 23.5 million dollars. Environmental costs were also factored in. Planes idling on runways, holding patterns, rerouting, wasted fuel and increased emissions were calculated at 1.2 million dollars.

The grand total, when you add passenger time lost, airline operational costs, indirect societal costs, and environmental costs, was seventy-seven million dollars.

(08:27):
That's just one day. And to our knowledge, nobody was injured or killed. But still, seventy-seven million dollars evaporated into the ether.

It raises questions. Why isn't such a sensitive buried utility encased in concrete, or conduit, or better protected? I don't have that answer. But this shows how reliant we are on these communication systems. Take out two airports in one city, and you paralyse a major hub.

Thinking back to my time with the Canadian Common Ground Alliance, we once commissioned a societal cost report through an external contractor, Serrano. Based on damage reports that were voluntarily submitted to the CGA and CCGA, the report estimated that damages were costing Canadians over one billion dollars annually. In Alberta alone, it was about 350 million per year, roughly a million dollars a day.

And I'm absolutely convinced that's an underestimation. Only voluntary reports were counted. Regulators like the Canada Energy Regulator, the Alberta Energy Regulator, or the BC Oil & Gas Commission mandate reporting, but most utilities don't. Without legislation mandating reports, the real number could be closer to five billion annually.

Think about what five billion dollars could do for Canadians. Instead, it disappears into mistakes—often because no locate request was submitted, or because someone failed to properly hand-expose assets. These are totally preventable.

(12:20):
When you look at that and you realise the impact, yes, you can hurt somebody, yes, you can have fatalities. Thankfully, the majority of the time that doesn't happen. But when I look at the budget for Utility Safety Partners, when I consider the budgets for BC, Saskatchewan, Manitoba, Ontario, Quebec, the Maritimes, all the systems that promote the damage prevention process, you see how important it is. When you submit a locate request, you are initiating a process where so many parties become involved. Everything they do is designed to prevent damage. And that process doesn't really have a chance if you don't submit that locate request. This is the kind of outcome that can result.

When I posted about this on LinkedIn, since I had a fair bit of free time, I knew it would probably get some interest. This has probably been the most impressions any of my LinkedIn posts has ever received—well over three thousand now. Before this, I think my highest was over two thousand for something I posted years ago, a photo of a little Hot Wheels truck with the Alliance logo on it. That really pales compared to this.

The CCGA wasn't the first to do a societal cost report. I looked back and I think it was before 2010, maybe 2005, when the Ontario Regional Common Ground Alliance did its first societal cost study. I believe that was under the leadership of Jim Douglas, the first president of the ORCGA. It was groundbreaking—pardon the pun. They were the first to start really looking at the cost of damage.

Even something as simple as damage to buried cables that provide a signal to an intersection can have a ripple effect. What are the costs of that? People late for work, accidents, emergency services delayed. There was even a situation in Grande Cache, Alberta, a number of years ago where telecommunications lines were damaged. Those lines provided financial transactions, 911 services, everything. People couldn't even buy gas because their debit cards didn't work. It happened twice in a short period of time. Obviously, these are inconveniences, but what if you took out 911 services to a community? What if you took out fibre optic telecommunications to a hospital and there was a fatality as a result? You don't know right away, and you may never know, but the likelihood and risk are there.

The Canadian Common Ground Alliance is now working again with Serrano to do a new study on this. The first one was done over five years ago, pre-COVID, so it's time.

This is what I wanted to talk about today. And my producer, Doug Downs, is joining me for this discussion. Hey, Doug, I've been rambling here, but I'm blown away.

Doug Downs (16:10):
I'm blown away by the societal costs here. While you were talking, like everybody else, I got distracted. I was going through my phone looking for other numbers. I was thinking, well, I assume you and I pay for this within our ticket price, that this cost is part of airline operations. Prices in the U.S. aren't regulated anymore; that changed in the seventies. But transparency of pricing is regulated, so they have to show what goes into the ticket price. I was looking at things like overbooking, dynamic pricing, no-show revenue—that accounts for a small portion. The big drivers are operational costs like labour, airport fees, fuel. But under operational costs are incidents like this. So you and I, when we fly up to Edmonton for that short half-hour flight, we're paying into a system that covers breakdowns like this. Because mathematically, they're going to happen.

Mike Sullivan (17:29):
Well, it does affect us, even if we don't see it. Maybe it's infinitesimally small, but it's there. Who knows how small? Or maybe it's not that small. I mean, 1,800 flights, 77 million dollars—that's a lot of money. And that was just one airport system, two airports.

Doug Downs (17:47):
And I was also thinking, okay, but these airlines make gobs of money off me, right? They're rolling in it. According to the International Air Transport Association, though, profit margins for airlines are notoriously thin. Razor thin. About seven dollars per passenger. I was stunned reading that. They're basically making the equivalent of a candy bar off me every time I fly.

Mike Sullivan (18:20):
Pretty much, yeah.

Doug Downs (18:24):
Now I feel bad for asking for the full can of Coke.

Mike Sullivan (18:30):
Yeah. You think about it, right? The competition is fierce. The impression I have is that the regulation of air travel is probably more stringent in Canada. We don't have as many choices for major carriers, but I feel safe. When I get on a plane here, I feel safe.

Doug Downs (19:01):
So, you outlined the millions of dollars that this clipped fibre optic cable cost. Why don't we just find out who did it and charge them?

Mike Sullivan (19:09):
Can you imagine being that person right now? Who knows? Maybe they did have a locate request. Maybe they did everything right, and maybe that fibre optic wasn't where it was supposed to be. Or maybe it was dislocated. We have no idea.

Doug Downs (19:28):
The ground moves. I get that.

Mike Sullivan (19:32):
Exactly. Without knowing the circumstances, all we really know is what CNN reported: two cut fibre optic cables. Who knows? Was it deliberate? We don't know.

Doug Downs (19:45):
But theoretically, let's say the ground didn't move here. Let's say there were markings, but they ignored them and just started cutting. Why can't we charge them?

Mike Sullivan (20:02):
In the U.S., that would be handled under state law. There would be a claim. If I were one of those airlines looking at seventy-seven million dollars in societal costs, I'd certainly want to know who was responsible. But here in Canada, it's different. We don't have comprehensive legislation like some U.S. states or even Ontario. Every damage is different. If a person does everything they're supposed to do, and still hits something, well, something went wrong—miscommunication, inaccurate records, whatever the case may be—and usually the utility will work with them.

But if it's someone who knew what they were supposed to do, has been through it before, and is a repeat offender, then there's little leniency. Excavators who dig for a living can't ignore what they're supposed to do, legislation or not.

In general, when there's a damage, the claims process kicks in and everybody gets named. Even Utility Safety Partners, previously Alberta One-Call, would be named. Then you have to clear your name. In my fifteen years with the organisation, I can only think of once or twice that I've actually had to defend Alberta One-Call in a legal proceeding.

I remember one case where we did everything right, the utility was notified, our role was followed. Yet the judge kept pressing me as though we hadn't. It struck me that maybe the legal system needs more education on how this process works.

But we've been lucky. And since moving from calls to clicks—mandating that locate requests be made online instead of by phone—our exposure has dropped dramatically. Before, I used to see half a dozen or more claims a year where Alberta One-Call was named. Since the switch to clicks, I can't even remember the last time we were named. The reason is simple: the person submitting the locate request is doing it themselves online. They say, "I'm digging here," they submit the request, they get a map. The GPS coordinates are clear. If a damage occurs outside of that site, it's obvious they were digging where nothing was located. That has dramatically reduced claims, not just for us, but also for utility owners.

Doug Downs (24:39):
So the only action is civil action then. The ones I'd want in the crosshairs are the repeat offenders, whether homeowners or contractors. Contractors especially—they dig in the same areas all the time, they know what's under there, and when something goes wrong it's often because the dig wasn't processed properly.

Mike Sullivan (25:08):
Every situation is different. But here's one statistic I'll never forget. When there is a locate request, the likelihood of damage is less than one percent. When there isn't a locate request, the risk of damage skyrockets. It's like Russian roulette—you might miss a few times, but eventually you'll hit something.

There was a video years ago by Interprovincial Pipelines, now Enbridge. It was called *It's Your Call*. It used a roulette wheel to illustrate the process. Every time it spun, the wheel would land on "miss"—until the very last spin, when it landed on "hit." It was very effective, even if the video looks dated now. That message is still valid today.

Pair that with the societal cost data, and you see how serious this is. Thankfully, we don't have a lot of examples where someone is seriously hurt or killed, but the risks are always there. And the societal costs are always there too—environmental costs alone can be enormous. Think of a crude oil pipeline strike contaminating water or soil. Cleanup costs alone are massive.

Look at the Kalamazoo River spill years ago, or the Exxon Valdez. Different kinds of incidents, but the societal costs and reputational damage lasted decades.

Mike Sullivan (28:34):
These kinds of societal costs don't just disappear. They linger, sometimes for decades. And as you said, Doug, the reputational damage is part of it too. But going back to this incident that happened to me, there were so many people affected. The peculiarity was that we were all coming from a damage prevention conference, and then this happened. It was just too uncanny not to bring up here. This is the real threat. Yes, there's always the threat of injury or fatality, but the societal costs are constant.

I'm very curious to see what the Canadian Common Ground Alliance and Serrano come up with in the new report. Serrano is a fantastic organisation from Quebec that I had the chance to work with years ago when I was with the CCGA. It was Info-Excavation in Quebec that brought them forward. Their first study on societal costs was groundbreaking. At the time, the U.S. Common

Ground Alliance had only looked at the direct cost of repair. The Canadian study went much further, looking at ripple effects.

When we pushed for legislation—Bill S-229—that data was critical. Those infographics were very effective when talking to decision-makers. It will be again.

(31:07):
But this incident reminded me that nobody is immune. We all rely on these systems, and we all have a role in preventing damage. I hope we eventually find out exactly what happened in Dallas, but given the cost and attention, it may never be fully public.

Doug Downs (32:01):
It's mind-boggling. I don't know how you even put a number to it.

Mike Sullivan (32:04):
Exactly. And that seventy-seven million is just the direct and obvious number. If you start to think about the ripple effects—missed connections, lost deposits, families missing trips—it's like dropping a stone in a pond. The ripples go on and on.

Doug Downs (32:34):
The most recent report I saw from the FAA simply emphasised the need to modernise equipment to prevent damage like this. I'm not sure what that means exactly.

Mike Sullivan (32:46):
No, neither am I. It almost sounds like they're saying, "Don't look over here, look over there." Modernise, yes—but does that mean better protection, conduit, or something else? Who knows?

(33:11):
Anyway, it's scary stuff. I wanted to bring this up and talk it through. We do have a couple of episodes coming up before the end of the Safety Moment season. Next time, I'll be joined by guests from the Facility Notification Centers Association. That organisation was created to bring One-Call centres together internationally, to share knowledge and improve what we do. Every superhero needs an origin story, and that's what that episode will cover.

After that, I hope to close off the year with an episode featuring Bill Kier from Pennsylvania 811. Bill has been active in this work for five decades and is still going strong. In fact, Pennsylvania operated Alberta One-Call in its early years. That collaboration across borders has always been important. Safety doesn't recognise borders.

(36:04):
I get frustrated when political climates create apprehension about cross-border work. My view is that we have to ignore that. By limiting ourselves, we're not providing the best we can. Cooperation is the only way forward.

And that really brings us to the end of this podcast. I want to thank Doug for joining me, our producer at Stories and Strategies. I hope you'll follow this podcast wherever you're listening,

and please leave a rating—it makes a big difference. You can also follow us on X at Utility Safety, or find us on Instagram, Facebook, and LinkedIn, where we tend to be most active.

If you'd like to send us a note or suggest an episode idea, you can email us at info@utilitysafety.ca. Please put PODCAST in big bold letters in the subject line.

I'm Mike Sullivan, president of Utility Safety Partners. Click to know what's above and below. One click costs you nothing. As we've heard in this episode, not clicking could cost seventy-seven million dollars. Thanks very much.