

“The Future Creates the Present” *World Futures Day* recalls “The Jetsons”



*Thomas Frey
Futurist*

Both our keynote speaker, Thomas Frey, and the representative of our lead sponsor, Brian Stuelpner of Schneider, opened their remarks on March 1 with references to the 1960s animated cartoon series, *The Jetsons*. We were reminded that the Jetsons lived in something looking suspiciously like the Seattle Space Needle (which didn't yet exist), used robot vacuums and smart phones, and even participated in “Zoom calls” on flat-screen TVs. What to make of it all? With that opening, our 300+



*Brian Stuelpner, VP,
Schneider*

guests at the KI Convention Center were mesmerized with signals of what the future holds and the evidence of developing trends. The eye-popping, inspiring presentations were punctuated with regular audience discussion and participation and great networking.



*Attendees enjoyed a continental breakfast
sponsored by Boldt.*

Where disruption and opportunity collide

After Brian Stuelpner announced that Schneider will have 100 autonomous trucks on the road by the end of this year, Envision Executive Director Steve McCarthy (with the help of ChatGPT) welcomed to the stage the founder of the DaVinci Institute in Colorado, Dr. Thomas Frey. As our keynote speaker, Frey advised listeners that “the future of innovation is where disruption and opportunity collide.” He told the group that he reads up to 1000 headlines a day, asking himself what is game-changing technology and what, on the other hand, is merely good intention?

“We’re a backward-looking society,” Frey explained, “but that’s human nature. Everything we come into contact with is history.” He suggested that the future gets created in the minds of all of us because our *visions* of the future drive our current action. “The future creates the present,” he said, “just the opposite of what people think. Change their vision of the future, and you change the way they make decisions today.” Offering visual examples of unexpected futures, such as rooftop swimming pools, strikingly humanoid robots, and the purported Tesla

PI phone, he advised that “most aspects of the future can be predicted with a high degree of probability.” The future, Frey said, is formed around a foundation of stable, slow-moving elements. The greatest uncertainties are in natural systems and human systems, so those are the keys to understanding the future. To illustrate, Frey used content from his recent course, *Future Like a Boss* (admittedly his “Covid project”), elaborating on two of the eight strategic futurism techniques the course presents.



Many Envision board members hosted local leaders at their

First, Frey explained, one must create a futuristic attractor, as Steve Jobs did so well. “Start with a vision,” he said, and then add dimension and realism. Build elements of purpose to unleash the vision, and then create relevance. Frey showed examples of multi-billion-dollar megaprojects that accomplished those steps, including the tallest statue in the world (Sardar Patel, India’s first prime minister), which dwarfs the Statue of Liberty many times over. He showed his listeners four proposed bridges around the world that would dramatically change the human landscape, Saudi Arabia’s “Neom” proposal, called *The Line*, that tremendously shrinks the human footprint, artificial glaciers, and the proposed colonization of Mars.

Frey used the rest of the morning to introduce and explain eight emerging technologies that he believes will change the world. He proposed the possibility that we might, in the future, each have a digital twin, possible perhaps by 2036. It all began by modeling physical devices, he explained, and could soon result in “remote robotics”: a driverless tractor working a Wisconsin farm, directed by a sun-seeker in Arizona, for example, or that digital twin who will have perfect recall of all the things you have forgotten.



Digital twins, cell culture bioreactors, autonomous transportation, and more...

Next he presented a technology close to the heart of Northeast Wisconsin, cell culture bioreactors. He mentioned Mosa Meats and its first-ever lab-grown hamburgers in the Netherlands, and showed photos of a slaughter-free meat plant in Israel that generates meat

from actual animal stem cells. Here in the U.S., he explained, we'd probably have to start with cultured exotic meats like wombat or penguin to ease us into the idea of replacing a Wisconsin-grown steer. "But anything grown in nature can be grown in a cell culture bioreactor," he said, including milk (even breast milk), blood, leather, wood, tusks and horns.



The audience was asked to give input after each section of Frey's presentation.

Following a bit of nervous laughter among the audience, Frey descended from the stage with a microphone for the first of many forays to seek responses, questions and comments from listeners. He asked whether they thought this might be the real future, or just a passing fad. And he wondered whether dairy farmers would support the concept and what people might consider the long-term health implications. Schreiber leaders added that producing dairy protein from cell cultures is already happening, citing the company Bored Cow as an early example.

Autonomous transportation was the next fascinating technology, what Frey referred to as "the most disruptive technology in history." The car loan and car insurance industries as we know them will disappear, he said. And he proposed a string of related questions: Will this new vehicle look more like a car or like a van? Will we own it or rent it? If we don't own it, how much privacy will we have when we're in it? Will the government be able to track our movements? And at what age will a child be capable of traveling alone in a driverless car – and for how long a journey? Will this increase or decrease the number of cars on the road?

Frey posited myriad new business approaches that autonomous transportation might introduce: a driverless convenience store that comes to *you*; a mobile office that drives around, convening meetings with different groups; dog grooming businesses and nail salons that come to your home; even mobile bars, vending machines and hotel rooms that travel to the appointed destination. He pointed out that driverless mobile doctor offices are already in play, and he ended this portion with a vision of a huge warehouse that opens its doors each day to a variety of diverse autonomous business vehicles that drive in and create the mall for that day.



Frey encouraged listeners to offer their own ideas about these emerging technologies.

Life with drones and robots, in our 3-D-printed homes!

Drones were next. Frey discussed their use in agriculture, monitoring crops, pesticides and livestock, and perhaps chasing away birds. He predicted that commercial drones will be a \$3.6 billion enterprise by 2030 and posed these questions to the audience: What problems might these drones create? Will we start building mini airports? Would drone ownership increase the value of your home? Maybe yes, if it's a perceived security advantage. Might a home someday own an entire fleet of drones? And then who will have the right (or obligation) to shoot them out of the sky? Does the Second Amendment allow for armed drones?



Frey spoke of the “irrational human,” explaining that the market is not always logical. For example: Why do we go to a coffee shop when we could easily brew our coffee at home? Sometimes it's not about the product, but it's about the value of the experience. He described the limits of automation; despite all the clear positives (e.g. robots are not cruel or prejudiced) he reminded his listeners that humans have something automation can't offer. Robots will add efficiency, but we less rational humans will choose, he predicts, both human-generated and robot-generated art, entertainment, dining, and such.

The speaker's remarks (accompanied by amazing images) of 3-D-printed houses were mind-boggling. He showed a video of the building of a 450-square-foot house in Russia, just this past January, via 3-D printing. Cost? About ten thousand dollars. Another image showed a high-rise being put together with a crane, each individual unit 3-D-printed at ground level. He pointed out that such construction makes flat walls obsolete – the very walls can now become art!



2030 and block chain credit bureaus to take over. Frey suspects all home purchases will be by digital payment by 2030, and such currency will be the major source of bank income in a little more than ten years.

Block chain and cryptocurrency must, of course, be part of the conversation. But, Frey said, older folks simply are not going to use them. He predicted that major retailers will soon accept crypto, and, within 3 to 5 years, banks will offer crypto services. He expects major credit cards to support cryptocurrency by

And then we turned to digital smart cities, which Frey said will be lively, vibrant and fun! He suggested we'll use block chain to pay our taxes, traffic will be efficiently rerouted in case of an emergency on the roads, and surveillance drones will be built into street lights. He predicted that policing will be "smarter" in the future and rescue operations more efficient. He also described fleets of surveillance drones using "search engines for the physical world," with super sensors that detect smells, tastes, textures and barometric pressure.



At this point Frey used the intriguing prospect of a robotic dog to illustrate a technique called "question mapping," to be used when you face a question you're having trouble answering. So, with images of possible robotic dogs up on the screen, audience members considered what the purpose of such dogs might be, how they might respond when they detect danger – even how they might communicate with other robotic dogs, and with us! And he suggested we ask ourselves why we're even considering a robotic *dog* instead of a robotic cat, or even a monkey.

The final portion of Thomas Frey's presentation was on the future of education. He explained that universities are "shooting behind the duck," training people for today's jobs, not for tomorrow's jobs. We now build our



teaching around just-in-case learning, he explained, and so most of us use little of what we learned in college. He asked the audience to consider artificial intelligence (AI) applied to teacher-bots. It would be like wearing "smart glasses," he said; they would record what we see and hear, and then later coach us on the basis of that.

Teacher-bots, micro-credits, and a bachelor's degree within months!



Think of the teacher-bot as a buddy, a coach, or even an assessor. This might be an AI confidant, therapist or friend. Frey explained that we consume information 12 hours each day, with no way to monitor salient pieces of wisdom. An AI-bot would be able to assess what is learned, perhaps even award "micro-credits" for our achievements. This might help us clarify goals and make better decisions based on an objective assessment of our needs and the suggestion of possible solutions.

Since proficiency comes from doing, the teacher-bot might assess our level of mastery and grant those micro-credits mentioned above. We'd get credits for reading a book or listening to a podcast. AI would keep the student engaged, Frey asserted, so learning would scale faster. One might earn a bachelor's degree in a few months, he suggested. People would be in a constant state of improvement, finally unlocking the person we were meant to be. He closed by pointing out that we face unprecedented opportunity: "There will be more change in the next 20 years than in all of human history to date."



Valuable networking during break time



Bringing it all home to Greater Green Bay

Following the keynote by Thomas Frey, who speaks all over the world about futuring, attendees at the event spent a few minutes focused specifically on our own community. Paul Linzmeyer, renowned local environmentalist with “Futures of Choice,” spoke about the environmental, social and economic impacts of internal climate migration on the Great Lakes Region. He recalled a gathering of concerned leaders at Lambeau Field 20 years ago when the question was posed: Why are our young people leaving the Green Bay area? At that time, Linzmeyer said, the commitment was made to communities of choice and companies of choice. “And now it has come to fruition,” he said.



Paul Linzmeyer
Environmentalist

He reminded us of the pronouncement by indigenous peoples that we don't inherit land from our ancestors; we borrow it from our children. “My dream,” he said, “is to have young people part of the design process.” Linzmeyer showed photos of Bay Beach from the 1940s, then reminded listeners of the necessary closure of that swimming beach in the past, and then showed a drawing of the reopened beach, as envisioned by the city, in about ten years.

Next he cited climate change problems around the country that will ultimately impact us, including the constant flooding in California and Florida, the dramatic increase in the number and severity of wildfires, and unsustainable water usage patterns. Linzmeyer pointed out that “billion-dollar disasters” have grown exponentially, from \$4 billion in 2011 to an average of \$20 billion in each of the past three years. For all of those reasons, he explained, we should anticipate the possibility of an influx of climate migrants to the Great Lakes area. We need to prepare our Northeast Wisconsin communities, he said, for the realities of climate change and its effects.



The following local companies provided financial support to make World Futures Day 2023 possible: Schneider, Green Bay Packers Give Back, Green Bay Packaging/George Kress Foundation, Schreiber, Capital Credit Union, Associated Bank, and Boldt. Envision plans to host the event again in 2024.