A call to action for Ohio PEs

Special tribute to an EFO hero, page 6
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LEADERSHIP VIEWS
by L. Steve Day, P.E., President,
Ohio Society of Professional Engineers

An essential & concise
guide to keeping your
PE license relevant

So, you are a professional engineer. You worked hard, earned the license and are practicing today.

But what if your license and livelihood were taken away – and you had no control? What if the public was suddenly subject to engineering designs generated by less-than-qualified, unlicensed individuals?

To avoid these pitfalls, please review my guide to keeping your PE license relevant:

Remember why you became a PE; use it as your motivation & as an inspiration to the public

One of the highlights that I look forward to, twice each year, is performing the master of ceremonies duties at the Ohio Engineering Certificate Ceremony. At the ceremony, which is set in the grand and historic Ohio Statehouse, new professional engineers receive their hard-won license certificates from the State Board of Registration for Professional Engineers and Surveyors.

As emcee, I talk to Ohio’s new PEs about the responsibility that they now face in protecting the health, safety and welfare of the public as they perform their work. I speak about the PE being the mark of a professional – the profession’s highest standard of competence, a symbol of achievement and assurance of quality.

When the ceremony has concluded, I like to talk with the new PEs and ask each of them, “Why did you pursue PE licensure?”

I receive many different answers to my question:

• One new registrant’s father is a PE and he wanted to follow in his footsteps.
• Another wanted to gain prestige among his fellow engineers and PE licensure was his long-time goal.
• With the PE license, another new registrant felt more secure in his employment.
• “It was the challenge,” said another. “Not every engineer can pass the exams.”

What if your license was removed with the pound of a legislative gavel or the stroke of an executive’s pen?

• “I’ve been promised a promotion at work if I successfully pass the PE exam,” replied one young man.
• “Higher pay,” chimed in another. (And how very true!)

Also, I remind them, they can now start their own businesses, as I have done, offering engineering services.

And, reader, why did you become a PE?

Your personal reasons become your daily motivation to do your job and do it exceptionally well. In turn, your motivation will translate into passion in the public’s perception. And the public’s perception is everything to maintaining relevancy.

See “Staying relevant,” page 9

On the cover:
The I-70/I-71 Columbus Crossroads Project is literally at the doorstep of OSPE’s office in Columbus. While this project moves forward, other important infrastructure projects remain unfunded. PE, please extend your work as an advocate for the public’s health, safety and welfare by sharing with Ohio’s decision makers the critical need for infrastructure improvements. Photo credit: Holly Ross/OSPE. See story, page 4.
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LEADERSHIP VIEWS
by Tim Schaffer, Executive Director, Ohio Society of Professional Engineers

Joe Niedecken, PE, leaves a legacy through EFO

What does it mean to leave a legacy in your name to benefit engineering students of the future – forever?

In this issue of OhioENGINEER, we profile one OSPE member who did just that.

Joe Niedecken, PE, passed away this past winter, but not before putting together a program bequest that will benefit a lot of bright, eager-to-learn students entering the University of Cincinnati College of Engineering and Applied Science.

When Joe first called me, asking how to go about forming a scholarship fund, I assumed he wanted it named after himself. As it turned out, that was not his top priority. He wanted the message sent – loud and clear – through the fund’s name that his gift was about “paying it forward” and it was to be for scholarships at his alma mater, the University of Cincinnati.

Joe told me how important an EFO scholarship he had received was to his development as an engineer at the University of Cincinnati, and he wanted to pay it forward.

I could tell this was a passionate issue for him. It meant a lot. And I agreed that the “pay it forward” theme would make a great title.

We were in the midst of editing the fund agreement when fate unfortunately ended our conversations; Joe had unexpectedly passed away. But the work that Joe had started continues. In March, the EFO Board of Trustees passed a resolution to create the “Joe Niedecken, PE, ‘Pay It Forward’ – University of Cincinnati – Memorial Scholarship Fund.”

We have since established an investment account and accounting structure within EFO to execute Joe’s wishes. And we now are finalizing the scholarship fund paperwork to begin selecting scholarship recipients next year.

For the rest of time, the memory of Joe Niedecken, PE, will live on through the legacy he left a lot of students at the University of Cincinnati.

On behalf of those future scholarship recipients, I say, “Thank you, Joe!”

IN MEMORIAM

OSPE & EFO mourn the loss of two leaders:
James E. Brandeberry, PhD, PE, FNSPE & Tom L. Underwood, PE, FNSPE

James E. Brandeberry, PhD, PE, FNSPE, who served as president of the Engineers Foundation of Ohio, 1994-1995, passed at his home near Enon, Ohio, in September at the age of 78. He was born in 1939 in Toledo to the late Edward and Virginia (Strope) Brandeberry. With a doctorate in electrical engineering, Brandeberry served for 36 years at Wright State University where, in 1986, he became dean of engineering during an era of great growth and development. In 2009, he won OSPE’s Professional Engineering Management award. In his retirement, he turned a passion for wine-making into a family business and won awards for his wines. He is survived by his wife Sharon (Niederhauser) Brandeberry, daughter Susan (Martin) Wright, daughter Kelly Brandeberry, daughter Tammy (Alan) Flanegin, five grandchildren, a sister, a brother and several nieces and nephews.

Tom L. Underwood, PE, FNSPE, who served as president of the Ohio Society of Professional Engineers, 1970-1971, died at the age of 89 this past July in Dublin, Ohio. Underwood was born in Parkersburg, West Virginia, in 1929 to Victor and Ethel Underwood. He was predeceased by his wife of 46 years, Mary Ann (Vickers) Underwood, son Steven Alan Underwood, a sister and a brother. He is survived by his wife, Vicki Semione-Underwood, daughter Vicki Underwood, six grandchildren and two great-grandchildren. He worked for many years as a civil engineer, and he was involved in professional, church and volunteer activities.
A call to action for PEs:

Your expertise is needed to advocate for rebuilding Ohio’s deteriorating infrastructure

With the rising cost of air travel, many have taken to America’s highways. This prompts me to ask, “Are our highways safe and prepared to take on the additional load of users?”

Reviewing reports about our nation’s infrastructure – both reports produced by professional, industry-specific publications and those produced by the news media – leads me to one answer: “No!”

Two very prominent and reliable industry-specific publications highlight a spiraling decline in projected funds and a rising increase in needed highway, bridge and public transportation project funding, as well as water and wastewater project funding.

As you know, Ohio’s roads are heavily traveled

Your daily commute – or at least an occasional trip during rush hour – will provide ample demonstration that Ohio’s roads are busy.

Certainly we can deduce that more than 11.6 million Ohioans – not to mention our many out-of-state visitors – are making use of our state’s roads, highways and bridges for daily access to home, day care, school, work, shopping, natural resources, entertainment, and other public and private institutions.

Of course, there’s research that sheds light on exactly how busy our roads are, as well as how much infrastructure Ohio needs to maintain.

In June 2018, TRIP – a national transportation research group based in Washington, DC – released a report, which examines the condition, use and safety of Ohio’s roads, highways and bridges and future mobility needs. The report includes the evaluation of regional pavement conditions, congestion levels, highway safety data and a cost breakdown for Ohio’s major cities (i.e., Cincinnati, Cleveland-Akron, Columbus, Dayton and Toledo). Sources include, among other organizations, the Ohio Department of Transportation, the Federal Highway Administration and the National Highway Traffic Safety Administration.

According to the June 2018 TRIP report: “Ohio maintains one of the most extensive and heavily traveled transportation systems in the nation. Ohio ranks second nationally among states in the number of bridges, third in the volume of freight carried on its transportation system, and sixth in both miles of Interstate highways and total vehicle miles traveled.”

TRIP reported that vehicle miles traveled (VMT) in Ohio experienced a 12 percent increase from 105.9 billion VMT in 2000 to 118.6 billion VMT in 2016. Not only that, but “the rate of vehicle travel growth in Ohio has accelerated since 2013, increasing five percent between 2013 and 2016.”

TRIP also forewarns us that the daily commute for Ohioans is not expected to improve: “By 2040, vehicle travel in Ohio is projected to increase another 20 percent.”

TRIP & ASCE “Report Card” reflect the condition of Ohio’s infrastructure

The TRIP report tells us a lot about Ohio’s roads, bridges and traffic.

“Twenty-three percent of Ohio’s major locally and state-maintained urban roads and highways have pavements in poor condition and 12 percent are rated in mediocre condition,” which costs state drivers an estimated $3.5 billion in vehicle repairs, fuel consumption and tire wear.

The TRIP report also highlights that seven percent of Ohio bridges are structurally deficient with significant deterioration of deck supports and major components.

Sadly, traffic related crashes in Ohio,
the report continued, claimed the lives of 5,360 Ohioans from 2012-2016. That’s an average of 1,072 deaths per year.

“It is estimated that roadway features are likely a contributing factor in approximately one-third of fatal traffic crashes,” the TRIP report explained. “Roadway features that impact safety include the number of lanes, lane widths, lighting, lane markings, rumble strips, shoulders, guard rails, other shielding devices, median barriers and intersection design.” TRIP said that while Ohio’s overall traffic fatality rate is lower than the national average, the state’s fatality rate on rural roads is disproportionately high – about 2.5 times higher than on all other roads in the state.

Another well-respected publication – this produced by the American Society of Civil Engineers (ASCE) – also rates the nation’s infrastructure. ASCE’s 2017 Infrastructure Report Card gives our nation’s roads a grade of D-, transit a grade of D- and bridges a grade of C+. (ASCE uses “C” to indicate “mediocre, requires attention” and “D” to signify that the structure is “poor, at risk.”)

According to the ASCE Infrastructure Report Card, Ohio itself has “122,926 miles of public roads, with 17 percent in poor condition.” Also, ASCE reported, 1,942 of Ohio’s 28,284 bridges are structurally deficient.

ASCE’s Report Card also grades our nation’s drinking water and wastewater, which earned a D and a D+ respectively.

The ASCE national ratings for roads, bridges and drinking water remain unchanged from 2013.

Infrastructure fixes carry a hefty price tag for Ohioans

The annual cost of aging and ailing infrastructure on the individual Ohio motorist is spelled out in dollars and cents in TRIP’s new report on roads and bridges: Unfortunately, “Ohio motorists lose a total of $12 billion per year on roads that are rough, congested and lack some safety features – as much as $2,180 per driver,” according to TRIP’s research and communication staff. The $12 billion figure comes in the form of “extra vehicle operating costs (VOC) as a result of driving on roads in need of repair, lost time and fuel due to congestion-related delays, and the costs of traffic crashes in which roadway features likely were a contributing factor.” Vehicle operating costs might include “accelerated vehicle depreciation, additional repair costs, and increased fuel consumption and tire wear.”

ASCE’s 2017 Infrastructure Report Card gives Ohioans two more formidable price tags: “$12.2 billion in drinking water infrastructure” and “$14.58 billion in wastewater infrastructure” will be needed over the next 20 years.

The costs of potable water and safe wastewater may seem steep. But not addressing a solution to cover them for the next generation? That’s unthinkable.

Current funding & spending vs. projections for the foreseeable future

TRIP announced that while additional investment has allowed Ohio to move forward with some transportation projects, “many projects remain stalled due to a lack of available funding.”

At present, the majority of highway funding comes from gas taxes and motor fuel user fees. The Ohio Construction Information Association reported that the federal gas tax was last increased to 18.4 cents per gallon in 1993, and Ohio’s gas tax was increased to 28 cents per gallon in 2005.

The TRIP report documented transportation spending levels of $2 billion in 2017 and $2.35 billion in 2018. TRIP’s report also stated that the projected transportation funding level proposed for 2019 has been set at $1.85 billion, and another $1.7 billion proposed spending in 2021. TRIP expects a decrease of $500 million dollars from 2018 to 2019, and another $150 million dropped by 2021.

Another concern, TRIP reported, is that inflation has eroded buying power of user fee monies.

Yet another concern – this from my own observations: With the increased number of fuel-efficient cars and electric cars on our roads, we may presume that the gas tax will not be sufficient in funding many needed future highway projects. Alternative funding sources have been suggested:

- Increase the annual registration fee for licenses
- Charge an annual user fee based on reported annual vehicle miles
- Increase the gas tax
- Charge a percentage per gallon (e.g., five percent to 10 percent per dollar per gallon)
- Institute more toll roads

Whatever course of action Ohio takes, it is important to remember that the Ohio Department of Transportation reported in Access Ohio 2040 – the State of Ohio’s 2014 long-range transportation plan – that it anticipates a $14 billion shortfall by 2040 to maintain state highways, bridges and transit services.

Ohio gubernatorial candidates provide insight on the future of infrastructure funding

With the race for Ohio’s next governor, most of the state’s candidates have openly discussed the importance of rebuilding and maintaining the state’s infrastructure.

Over the first few days of August, it was widely reported that Republican Mike DeWine announced that his strategy would include appointing a blue-ribbon commission to make a “quick assessment” on the status of infrastructure and develop funding recommendations. As The Columbus Dispatch (August 2) reported, DeWine would engage in discussions with voters about how to raise infrastructure funds.

Also widely reported in early August, Democrat Richard Cordray has proposed a $1.8 billion bond package to improve the state’s infrastructure. According to The Dispatch, he has also proposed reopening an office in Washington, DC, to advocate for federal infrastructure funding, creating a state data exchange dedicated to transportation and infrastructure, dedicate state funding to public transit, and developing a statewide plan for water quality.

As Cordray announced on August 4 via Twitter, his infrastructure plan includes the following components: “Repair & maintain our roads, bridges & freight facilities; Invest in public transit; Expand access to Broadband across the state; Upgrade underground infrastructure to protect our clean water.”

Green Party candidate Constance Gadell-Newton’s platform includes upgrading transportation, watershed management, clean energy and green infrastructure. According to her statement on the Green Party of Ohio’s website, Gadell-Newton also advocates for an investment “in Ohio’s public transportation systems, using State and local bond issues and multiple alternative funding sources that allow for capturing of revenues generated through community economic
Grateful & generous Joe Niedecken, PE, makes 'paying it forward' a priority & his legacy

In the all-too-short months before he passed at his home in Maumee this past February, Joseph Anthony Niedecken, PE, age 52, reflected on the gifts he had been given as he started his engineering career, and he made "paying it forward" a top priority.

Retha, Niedecken’s loving wife, said, "His kind, generous, warm nature was ever present.” And, after he passed, the Engineers Foundation of Ohio (EFO) was notified that Niedecken left a substantial bequest to EFO to create a scholarship that reflects both his nature and his values. His legacy will continue through the Joe Niedecken, PE, "Pay It Forward" - University of Cincinnati Memorial Scholarship Fund.

“One of the best things current professional engineers can do is to come along side the next generation and aid them in joining us,” said EFO President Travis Rhoades, PE. “Mr. Niedecken’s actions show his commitment to that cause, and I am grateful that he led by example in giving back to the future of our profession.”

The birth of a legacy

It was apparent to those who knew him: Niedecken was inspired to create a scholarship, and he was committed to seeing his goal come to life.

"Joe put himself through college," Retha explained. "He wanted to perpetuate that for other students working their way through school.”

When his father died in 2015 at the age of 92, Niedecken started contemplating his own estate. Retha – with her background as an attorney – agreed it was important to have things in order. So, they started working on their wills and figuring out who their beneficiaries might be. And that’s when Niedecken began formulating his plan to create a scholarship to benefit engineering students at the University of Cincinnati.

Over the next two years, long hours at PBF Energy and a weekly commute between Parsippany, New Jersey, and Maumee left Niedecken only occasional weekends to participate in other pursuits like travel and estate planning. But when he retired in 2017, he and Retha had time to enjoy a big, special adventure – a trip to Africa.

At that time, Niedecken also doubled his effort to establish the scholarship he had been envisioning. Later that year, he began communicating with EFO about the logistics for setting up a fund. He kept busy contacting dozens of friends and former colleagues about their willingness to contribute to the cause that would someday soon benefit University of Cincinnati engineering students.

Altogether a self-effacing man, Niedecken had no plan to name the scholarship after himself. Rather, that decision came later from Retha after her husband had passed, most unexpectedly.

Niedecken simply wanted to call it the "Pay It Forward” scholarship, which reflected two of his values: modesty and giving back.

Niedecken – himself a recipient of an EFO scholarship – graduated, magna cum laude, from the University of Cincinnati in 1988 with a bachelor of science degree in chemical engineering.

Later, as a licensed professional engineer, Niedecken was known for his commitment to safety and his distinguished career in the petroleum and refining industries, which spanned nearly 30 years.

As Retha said, "He gave his best everyday doing what he ‘always wanted to do.”

Joe Niedecken, the aspiring ChemE

Born in Delphos, Ohio, in 1965, Niedecken was the son of Charlie and Esther. Charlie had a little corner store in Delphos – Niedecken’s Carry Out. Esther was the store’s bookkeeper. Together, they had five children.

Retha said, "They had a very happy home, but it was not an income that could put all the kids through college. And Joe was the youngest.”

"Joe was always interested in science and chemistry,” Retha continued. "When he was seven or eight, he requested and got a chemistry set for Christmas. As he got older, he started looking into career paths in high school, and he migrated into chemical engineering.”

Niedecken’s older brother Harry also became a chemical engineer, but, as Retha said, her husband came to the same conclusion without fraternal influence: “Joe was his own person with his own independent interest in chemistry.”

At Delphos Saint John the Evangelist High School, Niedecken was a member of the band and the wrestling team. In his senior year, he was president of the student council and the team captain for the Chemistry Bowl. (His team won first place in the division.)

When he graduated in 1983, he was in the top four students of his senior class.

As Retha proudly proclaimed, "Joe made straight A’s in school.”

In digging for more information, the staff of the Ohio Society of Professional Engineers (OSPE) unearthed the August/September 1983 issue of OhioENGINEER. Niedecken’s young face confidently gazed up from the page, which highlighted the 1982-1983 winners of EFO scholarships. His name had been submitted by OSPE’s Lima Chapter for an EFO engineering scholarship – specifically the Battelle-University of Cincinnati scholarship.
That EFO scholarship helped him get through school, and he remembered that through the years.

In addition to the EFO scholarship, Niedecken resourcefully funded the rest of his education by taking advantage of his co-op experiences at the University of Cincinnati. As Retha explained, he would work the co-op program one term to pay for his education the next.

"That’s how he worked and paid for himself to go through school," Retha said. "Every other semester he co-oped with companies in the refining industry."

"He loved it at the University of Cincinnati," Retha said. "He still has friends today that he made there – all engineers. As he said, it’s a different breed.” Niedecken and his engineering buddies stuck together. Having met in the dorms, they also went on to rent living quarters with one another.

"Joe did the most moving around, but they all stayed pretty close, and they came to his funeral," Retha said.

**Growing careers & building a reputation for safety**

Through the co-ops, Niedecken obtained hands-on, practical experience in the refining industry and it stayed with him; it became part of his career path.

After college, Niedecken worked his way through the ranks.

Retha remarked that Niedecken was proud of being a professional engineer: "In the refinery industry in the 80s, the PE was more sought after than a master's or a PhD. There was definitely prestige behind obtaining the PE license."

"Joe was very ethical," Retha said, "He tried very hard to maintain his personal values and personal ethics and match those with professional ethics as well."

Extensive experience in on-site refining allowed Niedecken to contribute to many roles at a variety of companies, including BP, ConocoPhillips, Valero and PBF Energy. Indeed, Niedecken’s job in the petroleum industry took him and Retha to new homes around the country with some frequency.

With a background in private practice employment law, Retha’s career transitioned with each move, and it led her to diverse and important work. Retha has served in higher education as in-house counsel for a college district in Texas. In Ohio, she volunteered as a guardian ad litem for abused and neglected children. More recently, Retha applied her legal background to a new job as the ombudsman at Louisiana State University so she could be near and care for her ailing Mom in Mississippi, where Retha grew up. (When he passed, Niedecken had been preparing to sell their Maumee home so he could join Retha in Baton Rouge.)

While Retha found a variety of ways to put her law degree to excellent use, Niedecken was focused on safety as he worked diligently in operations at the refineries. As a matter of fact, he developed a reputation for safety, which led to corporate recognition.

"Joe had said the refining industry can be a dangerous situation with the combustibles." However, Retha reported that Niedecken told her: "There is a way to do this that’s safe. There's no reason for fires and injury if you don’t cut corners. There’s a process. If there are 20 steps to shut down a unit, you need to do all 20 steps – not cut it back to 12."

"It would’ve destroyed Joe if anyone was hurt under his supervision," Retha said. And she knew he worried about the possibility.

Thankfully, and in great part due to the diligence of Niedecken and his teammates, nobody was ever hurt.

Support Engineering Education: 
Look for the EFO check-offs on your NSPE-Ohio membership renewal.

Adventurer Joe Niedecken, PE, prepares to take a photo safari in the Serengeti, Tanzania.
In fact, when he was working for BP’s Marcus Hook Refinery, Niedecken’s team won the supreme prize in the BP Chairman’s Awards for Health, Safety and the Environment. Niedecken represented his team at the awards ceremony in London.

To comply with Clean Air Act regulations, most facilities recover and incinerate the vapors (volatile organic compounds) that are generated from loading gasoline onto barges. However, Niedecken’s team members at Marcus Hook were honored for their innovation in developing a system that recovered and used the vapors in the refinery fuel system. The gasoline vapors were mixed with natural gas to make them safer to handle, and the system saved the refinery about $500,000 per year in fuel use compared to the incinerator option.

While Retha suspected that her husband had earned other awards, too, he was quite humble; he did not mention any other accolades.

“He really didn’t want a lot of recognition,” Retha said. “He saw things as a team effort. The success of the whole meant the success of each individual.”

Adventurer, family man & compassionate giver

When he retired in 2017 – remarkable, as this is quite an achievement at age 52 – Niedecken was at the height of his career. However, as his loved ones said, he “looked to a future of new adventures and opportunities to serve his community.”

Retha said, “There’s work Joe and there’s vacation Joe. Work Joe was very serious and pensive. Vacation Joe released all of that.”

As an adventurer, Niedecken was always eager to travel – Ireland, England, Paris, Germany, Prague, Africa – and try new things. He enjoyed hot air balloons, roller coasters, museums and art. (Retha laughed as she said when it came to the roller coasters, she would hold her wallet.) In Africa, Niedecken whole-heartedly bungee jumped and took the zip-line across Victoria Falls on his birthday.

However, it is most important to note that Niedecken was primarily a family man who also liked to give and help people.

“He was a very generous person with his time and his money, and sometimes just listening to people,” Retha said. “He was very good to many.”

Niedecken volunteered his labor building with Habitat for Humanity in Texas. He also contributed to the Catholic church and its charity, a local homeless shelter, the Toledo Zoo, and Alzheimer’s and Parkinson’s charities. (The last two charities were significant to Niedecken because Retha’s mother has Alzheimer’s and Niedecken’s mother had Parkinson’s.)

He was most content in his river-front home with his beloved wife and canine companions, Fritz and Grace. Sadly, Fritz passed two months after Niedecken. (Grace continues to enjoy life with Retha in Baton Rouge.)

Niedecken was considered a “favorite uncle” and his entire family enjoyed trips to visit him – especially during Mardi Gras in New Orleans.

"Joe put himself through college. He wanted to perpetuate that for other students working their way through school."
– Retha Niedecken

There’s a good love story, too

Speaking of the Big Easy, that is where Niedecken and Retha met.

“We were both living in New Orleans,” Retha reminisced. “He was working at ConocoPhillips, and I was practicing law at a firm. It was a fix up.”

Retha’s coworker, Diane – who was married to the refinery manager, John – believed Retha and Niedecken would make a good match. At a fateful law firm Christmas party, John met Retha and enthusiastically agreed with Diane’s assessment. However, it still took time for Diane to convince Retha.

Finally, after a few months, “I heard a little voice saying that I should go out with John’s friend,” Retha said.

Diane called John immediately and told him, “Do it, do it, do it!” John, in turn, gave Niedecken a glowing report of Retha.

Retha said Niedecken thought it seemed out of character for John to make a social suggestion. Yet, when John popped back in later to say, “If you don’t do it, I’ll think you’re crazy,” Niedecken knew he just had to call Retha.

The rest is history. Niedecken and Retha dated for nine years before they married in 2013. They spent 14 years together, and Retha called him “the light of my life.”

Joe Niedecken, PE: A lasting legacy

“What I’d want people to know about him is that he was a genuinely kind person,” Retha said. “He was very smart and everybody always talked about that. As smart as he was, he was 10 times more a compassionate person.”

Known for his intelligence, his work, his commitment to safety, and his love for family and adventure, Niedecken’s legacy includes compassion and giving – both of which are in the scholarship that, despite his modest nature, now bears his name. Like Retha, the leaders of the Engineers Foundation of Ohio believe that generosity of spirit like Niedecken’s needs to be recognized, celebrated and remembered for generations to come.

Preceded in death by his parents and his sister, Sharon (Carl) Rheuther, Niedecken is survived by Retha, sister Becky (Chuck) Ansley of Columbus, brother Ed of Toledo, brother Harry (Debbie) of Pleasanton, California, and several in-laws, nieces, nephews, great-nieces and great-nephews.

Donations in support of the Joe Niedecken, PE, “Pay It Forward” - University of Cincinnati - Memorial Scholarship Fund may be sent to the Engineers Foundation of Ohio, 400 South Fifth Street, Suite 300, Columbus, Ohio 43215-5430.
Do not assume PE licensure is in a state of permanence

What if all your hard work in earning an Ohio PE license was for naught? What if your license was removed with the pound of a legislative gavel or the stroke of an executive’s pen?

I hope you have heard about the legislative threats to the PE license that are taking place around the nation. In the last few years, 32 states have seen some form of legislation or policy proposal that would undermine or altogether eliminate the state’s PE license.

Ohio’s infrastructure.

Indiana engineers found themselves in just such a position. The Indiana Job Creation Committee (IJCC) recommended the elimination of the PE license to then-Governor Mike Pence. Almost unbelievably the Committee also suggested “a voluntary system, such as the self-certification registry” in place of the PE license.

Thankfully, through the timely and considerable efforts of the Indiana Society of Professional Engineers (ISPE) and the National Society of Professional Engineers (NSPE), the regulatory recommendation was ultimately rescinded. However, the IJCC also said that it will continue to consider engineering licensure and, therefore, NSPE continues to monitor the issue in Indiana for further developments.

There is a good, information-packed article that I just read in the July/August 2018 PE magazine entitled “Under Scrutiny,” which talks about how NSPE is looking at the future of professional licensure.

In the article, a striking quote from Amy Barrett, PE, FNSPE, a past president of ISPE, caught my eye: “I went from a place where I thought I was fine and then to a place where there was a chance that everything that I had worked for would become irrelevant.” She continued, “It gave me a unique perspective that this can happen to any of us.”

And Ohio is not immune! Read our bill summary in this issue of OhioENGINEER for more information about the threats Ohio’s PEs are facing.

Leverage your NSPE/OSPE membership

I have only been OSPE president for a short time, but I have already sat down with four Ohio legislators to discuss four different bills that affect PEs or engineering practice. I also participated in the NSPE annual meeting this summer in Las Vegas where the topic of licensure attacks around the country was at the top of the agenda.

Follow my three simple steps to leverage your NSPE/OSPE membership and help keep the PE license relevant:

1. OSPE members, keep an eye out for legislation and policy initiatives that affect the PE license or that affect engineering work by undermining the PE’s authority. Report back to OSPE anything that you find. Our Legislative and Government Affairs Committee will review the information and, if appropriate, launch into action.

2. Please encourage unlicensed engineering graduates to work toward and become professional engineers. Remind them, as I remind Ohio’s new PEs, that licensure is the mark of a professional. As PEs they can expand their own professional marketability and they can better safeguard the public that we all serve.

3. Tell your nonmember PE friends and colleagues that it is imperative that they join NSPE/OSPE because we need to maintain our loud, clear and resonating voice at the Ohio Statehouse – a voice that cannot be ignored. NSPE/OSPE is the only organization that watches out for the PE license, and we are ever vigilant.

Finally, I welcome your comments and help as OSPE continues its work in protecting PE licensure and the public that we serve. Please contact me care of ospe@ohioengineer.com with your ideas and assistance.

From "Staying relevant," page 1

development and reduced traffic congestion in areas benefiting from public transportation system improvements.”

“Updating our water management to prevent lead poisoning and other toxins is also an important priority,” Gadell-Newton said. She also supports the expansion of bike trails and bike paths, as well as providing access to affordable public transportation for people with disabilities. Furthermore, she wants to promote worker owned and community owned wind and solar cooperatives.

Recently tapped Libertarian candidate Travis Irvine said, “When public infrastructure is in disrepair and government officials have a hard time finding funding, that’s a pretty clear sign that both budgets and priorities are out of control and need to be adjusted.” Irvine believes less money should be spent on the Ohio Arts Council and prosecution of marijuana offenses so the State can take care of infrastructure. “We also want to give flexibility to localities so they can vote to fund their own infrastructure if they wish.”

From "Ohio’s infrastructure," page 5

The PE’s perspective & influence on the fate of Ohio’s infrastructure

In addition to financing the much-needed fixes for Ohio’s aging and ailing infrastructure, a healthy investment in our structures and facilities would enhance lives by offering Ohioans greater mobility and resource access.

Furthermore, the tremendous potential for job creation and the resultant boon to the State’s economy should be apparent.

In an effort to better serve the public health, safety and welfare, I call upon Ohio’s professional engineers to continue to step forward and serve as advocates for the engineering profession – to educate and encourage federal, state and local political candidates to commit funding to the rebuilding of Ohio’s infrastructure.

Keep in mind, across the country, the National Society of Professional Engineers (NSPE) is the fighting arm of the engineering profession. The Ohio Society of Professional Engineers – with the support of NSPE – is the single, most powerful voice representing Ohio’s professional engineers.

As OSPE works to protect professional engineering licensure to the benefit of the public, we share the PE’s perspective on key issues with our legislators and government agencies, working together to influence policy decisions to benefit all Ohioans.
To follow is a summary of Ohio legislation that OSPE is monitoring:

<table>
<thead>
<tr>
<th>BILL</th>
<th>Description</th>
<th>Status</th>
</tr>
</thead>
<tbody>
<tr>
<td>WATER SEWER BONDS, Senate Joint Resolution 4 (Schiavoni)</td>
<td>Proposing to enact Section 2t of Article VIII of the Constitution of the State of Ohio to permit the issuance of general obligation bonds to fund sewer &amp; water capital improvements.</td>
<td>Status: 1st hearing in Senate Finance, 9/6/17. OSPE supports.</td>
</tr>
<tr>
<td>TRANSPORTATION BUDGET, House Bill 26 (McColley)</td>
<td>To make appropriations for programs related to transportation &amp; public safety for the biennium (7/1/17-6/30/19) &amp; to provide authorization &amp; conditions for the operation of those programs.</td>
<td>Status: Signed by Governor, 3/31/17.</td>
</tr>
<tr>
<td>WATER RESERVOIRS, House Bill 29 (Leland, Boggs)</td>
<td>To eliminate law authorizing the maintenance of buffers around municipal water reservoirs by contiguous property owners.</td>
<td>Status: 1st hearing in House Energy &amp; Nat'l Resources, 4/25/17. OSPE supports.</td>
</tr>
<tr>
<td>BIENNIAL BUDGET, House Bill 49 (Smith, R.)</td>
<td>To provide authorization &amp; conditions for the operation of state programs.</td>
<td>Status: Signed by Governor, 6/30/17.</td>
</tr>
<tr>
<td>PROFESSIONAL LICENSES, House Bill 75 (Gavarone, Merrin)</td>
<td>To establish an expedited process to grant a professional license to active duty military, or the spouse of such an individual, &amp; holds a valid license in another state. (Note: OSPE opposes the &quot;license by endorsement&quot; provision impairing Ohio's ability to protect the public.)</td>
<td>Status: 2nd hearing in House Armed Services, Veterans Affairs &amp; Homeland Security, 3/15/17. OSPE opposes.</td>
</tr>
<tr>
<td>PIPING MATERIALS, House Bill 121 (Edwards), Senate Bill 95 (Terhar)</td>
<td>To require a public authority to consider all piping materials that meet the engineering specifications for a state-funded water or waste water project.</td>
<td>Status: HB 121, 5th hearing in House State &amp; Local Gov't, 11/1/17. SB 95, 2nd hearing in Senate Energy &amp; Nat'l Resources, 10/25/17. OSPE opposes both bills.</td>
</tr>
<tr>
<td>HOME INSPECTORS, House Bill 211 (Hughes)</td>
<td>To require the licensure of home inspectors &amp; to create the Ohio Home Inspector Board to regulate the licensure &amp; performance of home inspectors.</td>
<td>Status: Passed House, 6/27/18.</td>
</tr>
<tr>
<td>OCCUPATIONAL LICENSING, House Bill 289 (Hood) &amp; Senate Bill 255</td>
<td>To require the periodic review of occupational licensing boards regarding their sunset. (Note: The bill forces the engineers’ regulatory board to spend resources preparing for an unnecessary &quot;sunset review,&quot; and the &quot;least restrictive regulation&quot; measure could only undermine the knowledge-base for engineering practice.)</td>
<td>Status: HB 289, 2nd hearing in House Gov't Accountability &amp; Oversight, 1/30/18. SB 255, passed Senate, 6/27/18. (Earlier, sub bill reported from committee.) OSPE opposes.</td>
</tr>
<tr>
<td>INTERIOR DESIGNERS, House Bill 504 (Pelanda)</td>
<td>Regarding interior designers. (Note: Bill references construction, planning &amp; design.)</td>
<td>Status: Sub bill reported from House Economic Dev't, Comm. &amp; Labor, 5/22/18.</td>
</tr>
<tr>
<td>TRANSPORTATION TECHNOLOGY, House Bill 519 (West, Kick)</td>
<td>To create the Ohio Council on Transportation Technology to make recommendations regarding state policies related to autonomous technology.</td>
<td>Status: Referred to House Transportation &amp; Public Safety, 2/27/18. OSPE seeks to include a position for a PE on the Council.</td>
</tr>
</tbody>
</table>
## LEGISLATIVE & GOVERNMENT AFFAIRS: 132ND OHIO GENERAL ASSEMBLY

### DESIGN CONTRACTS, House Bill 554 (Seitz)
- **Description:** To regulate the use of indemnity provisions in professional design contracts related to public improvements.
- **Status:** 3rd hearing (no testimony) in House Civil Justice, 5/23/18. OSPE supports.

### OCCUPATIONAL LICENSING, House Bill 583 (Henne)
- **Description:** To limit the occupational license & registration requirements & fees that a political subdivision may impose on state-regulated occupations, to establish a waiver exempting certain persons from paying occupational license or registration fees, & to revise the licensing restrictions applicable to individuals convicted of criminal offenses. *(Note: Bill removes from ORC 4733 references to "moral turpitude").*
- **Status:** 1st hearing in House Economic Development, Commerce & Labor, 5/22/18. OSPE seeks to retain "moral turpitude" as a reason to disqualify someone from engineering practice.

### AMUSEMENT RIDES, House Bill 631 (Hughes, Patterson)
- **Description:** To revise the laws governing amusement ride operation and safety, to designate this act as "Tyler’s Law," and to declare an emergency. *(Note: When employing a new chief inspector or an additional inspector, preference shall be given to PEs.)*
- **Status:** 1st hearing in House Agriculture & Rural Dev't, 6/27/18. OSPE is investigating this bill.

### ENVIRONMENTAL LAWS, Senate Bill 2 (Hite)
- **Description:** To revise specified laws relating to environmental protection.
- **Status:** Signed by Governor, 7/7/17.

### BRIDGE PROGRAM, Senate Bill 6 (Hoagland)
- **Description:** To extend the Ohio Bridge Partnership Program through fiscal year '19 & require the DOT director to submit a report to the Governor, Senate & House of Representatives recommending ways to continue to fund the program.
- **Status:** 1st hearing in House Transportation & Public Safety, 12/13/17, amended.

### SEWAGE SYSTEMS, Senate Bill 31 (Eklund)
- **Description:** To authorize a board of county commissioners or municipal legislative authority to elect to withdraw the county or municipal corporation from the application of any rule adopted by the Dep’t. of Health after 1/1/14, that governs the design of household sewage treatment systems.
- **Status:** 2nd hearing in Senate Energy & Natural Resources, 10/18/17. OSPE opposes.

### BUILDING CODES, Senate Bill 43 (Bacon)
- **Description:** To enable limited home rule townships to adopt building codes regardless of any similar codes adopted by the county in which the township resides.
- **Status:** Reported from Senate Local Government, Public Safety & Veterans Affairs, 6/27/17. OSPE opposes.

### LAKE ERIE, Senate Bill 51 (Skindell, Eklund)
- **Description:** To authorize the creation of a special improvement district to facilitate Lake Erie shoreline improvement.
- **Status:** Passed Senate, 7/10/18.

### LAKE ERIE DRILLING, Senate Bill 53 (Skindell)
- **Description:** To ban the taking or removal of oil or natural gas from & under the bed of Lake Erie.
- **Status:** 1st hearing in Senate Energy & Natural Resources, 2/22/17.

### PREVAILING WAGE, Senate Bill 72 (Huffman)
- **Description:** To allow political subdivisions, special districts, & state institutions of higher education to elect to apply the Prevailing Wage Law to public improvement projects.
- **Status:** Referred to Senate Finance, 3/7/17.

### FUEL TAX, Senate Bill 113 (Coley)
- **Description:** To levy an add'l registration tax; to authorize a motor fuel retail price reduction for consumers equal to the state motor fuel tax; & to exempt motor fuel that is sold at the reduced retail price from the state motor fuel tax.
- **Status:** 2nd hearing in Senate Ways & Means, 9/20/17.

### REGULATORY RESTRICTIONS, Senate Bill 293 (Peterson), House Bill 620 (Roegner)
- **Description:** To require agencies to reduce the number of regulatory restrictions by 30 percent by 12/31/2022. *(Note: While OSPE is opposed to both bills as introduced, the substitute version of Senate Bill 293 that passed the Senate clarified that the legislation affects the attorney general, secretary of state, auditor, treasurer, PUCO, office of budget and management, and the departments of administrative services, commerce, transportation, agriculture, natural resources, health, public safety and Medicaid, and the EPA, among others. However, occupational/professional licensing boards do not appear to be included in the reduction.)*
- **Status:** SB 293, passed Senate, 6/27/17. (Earlier, sub bill reported.) HB 620, referred to Gov't Acct & Oversight, 5/15/18. OSPE opposes both bills as introduced. OSPE is also analyzing the substitute bill passed by the Senate.
OSPE & EFO NEWS

Welcome, new members, to Team OSPE

OSPE welcomes 32 new members from July 11 through October 2, 2018:

Akron District Chapter
David Myers, P.E.

Canton Regional Chapter
David B. Cramer, P.E.
Victoria Magayah, P.E.

Dayton Chapter
Justin Delorit, P.E., Ph.D.
Sean M. Dyson, P.E.
Logan A. Tatman

Franklin County Chapter
Charles M. Garvick, P.E.
Christopher Lee Hunt, P.E.
Sandra A. Metzler, P.E., D.Sc.
Brendan Noone
Remon M. Wahba, P.E.

Lima Chapter
Henry Rodriguez, P.E.

Mahoning Valley Chapter
Michael P. Ciolli, P.E.
Michelle Kathryn Fleming

Northeast Ohio Chapter
Steven Barker
Michael Bowcutt
Tianlong Chen
Kenna Coltman, P.E.
Todd Lowe, P.E.
Greta Zacharyasz Noeth

Northeast Ohio Chapter (continued)
Sebastian Pino
Klaudia Holly Sirk
Kyle A. Snyder
Karolyn Spencer
Jing Tian
Aaron W. Urban

Southwest Ohio Chapter
Antoinette Alloy
Peter G. Dieterlen, P.E.

Toledo Chapter
Sajan Jeram
Daniel Toris, Jr., P.E.
Qiujum Zhu, P.E.

Tuscarawas Valley Chapter
Craig Frantz, P.E.

Thank you, Team EFO!

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OSPE & EFO announce quality CPD hours; save these dates

The Ohio Society of Professional Engineers (OSPE) and the Engineers Foundation of Ohio (EFO) have together planned more than 63 CPD hours for the 2018-2019 program year.

EFO’s Fall CPD Conference, worth 15.0 CPD hours, will take place this November 1-2 at Bridgewater Conference Center in Powell, Ohio. Mandatory ethics and rules education will be spotlighted at the two-day program.

Another EFO program, the December Seminar Series, will again feature a project management topic – change management – and it will be held in three markets: Cleveland (December 3), Toledo (December 4) and Cincinnati (December 7). At each location, the program is worth 6.0 CPD hours and 6.0 credits for project management certification or its renewal.

The flagship for EFO is ELI: The Engineer As Leader. Worth 10.5 CPD hours, ELI will again be held in Columbus at the Airport Marriott, next February 1-2. Jim Dalton is back to present his popular and unparalleled material, which covers a systematic approach to engineering leadership, touching engineering values and "level five leadership."

OSPE is excited to report that the Toledo Chapter has volunteered to host the 2019 All Ohio Engineering Conference! This program, worth 12.5 CPD hours, will be held at the Hilton Garden Inn Toledo-Perrysburg, June 6-8. Again, mandatory ethics and rules education will be included. It will also feature special technical and family tours as well as an awards program, a legislative luncheon, and a celebratory banquet.

In addition, our 2018-2019 PE Webinar Series has been launched! To date, two 1.0 CPD hour webinars have been promoted. The first, "Introduction to the Global Positioning System," opened on October 1. The second, "Water Quality Sampling Planning & Methods," opens November 1. More webinars are forthcoming over the 2018-2019 program year. For each webinar, participants will be provided 90-day access from the date of registration. The registration window for all webinars will close on June 30, 2019.

Finally, watch for information on an exciting, 5.0 CPD hour Ohio Engineers Legislative Day that is being planned for next May.

Call 1-800-654-9481 for details.
2018 Fall CPD Conference

Earn 15 CPD Hours at Bridgewater Conference Center in Central Ohio, Nov. 1-2!

Register online at OhioEngineer.com or call EFO at 1-800-654-9481 for immediate registration processing.