



transportation

TRACKS

North Carolina Local Technical Assistance Program (LTAP) Newsletter

WINTER 2023

Coordinators Corner

William Woods

Greetings fellow travelers! As you know I have 3 children who are, as most children their age, quite observant, so for this edition of the Coordinators Corner I am bringing a message brought to my attention by my 14 year old daughter on a recent drive together. Because of Dad's job, she has graduated to a 'Work Zone Grader' like myself. She has caught the bug that I am also infected with, which is when driving through a work zone we're counting cones in the taper, estimating the distances between the cones, and looking for the correct advanced warning signs. Well over time she has mentioned that there is one rule that is most broken, or ignored. A rule that I feel needs to be re-addressed, which is: to Cover, Take Down, or Remove your advanced warning signs when they are no longer applicable. I cannot tell you how many times I have observed a 'Flagger Ahead' sign when there ended up not being one. This action will put both workers and drivers in danger. Most everyone has read the story, 'The Boy Who Cried Wolf' where a young boy got a kick out of watching everyone scramble to safety when he announced that there was a wolf attack. So what happened when there actually was a wolf attack? Nobody believed him, and the wolf...well... I think you can figure out the ending...

Per the MUTCD, Section 2C.01 - The use of warning signs should be kept to a minimum as the unnecessary use of warning signs tends to breed disrespect for all signs. *In situations where the condition or activity is seasonal or temporary, the warning sign should be removed or covered when the condition or activity does not exist.*

Think of a situation where someone drives the same road several times a day, like my weekend night job as a pizza delivery driver. Me seeing a 'Flagger Ahead' sign the first time will slow me down and keep me alert for a flagger. But what if there is no flagger? Then that sign doesn't mean anything to me and I will start to ignore it. And why shouldn't I? The past several times I drove through the area there was no flagger, but now all of a sudden I'm traveling at regular speeds and there is a flagger telling me to stop. Hopefully I have time to stop safely. Now think about my soon-to-be-behind-the-wheel daughter driving and being told wrong. How about your new driver? Or ANY driver.

Cover or Remove signs when they are no longer valid. Correct signage is important. Take the time to cover, remove or turn your signs so the traveling public isn't incorrectly informed thus creating unsafe situations.

Safe driving is imperative. Arriving safely is our mission.

Stay Well, Stay Safe, Stay Informed!

In This Issue

Coordinators Corner- p. 1

A Few Thoughts – Respirable Silica Exposure and Enforcement in a Municipal Work Environment- p. 2

New Statue Honors NC State Basketball Great- p. 5

Construction Math-p. 7

Congratulations from NC LTAP to all of the North Carolina Awardees of Safe Streets for All Grants!- p. 8

Tailgate Talk- p. 9

What's Wrong With This Picture?- p. 10

transportationTRACKS

Technology Transfer Newsletter
Published by the North Carolina Local Technical Assistance Program
at the Institute for Transportation Research and Education at North Carolina State University



A Few Thoughts – Respirable Silica Exposure and Enforcement in a Municipal Work Environment

Paul McCain

Our parents and grandparents (and even before that) began adding this amazing ingredient called asbestos into concrete, floor tiles, paint and other coverings, ceiling tiles, roofing materials, pipe insulation, fireproofing and a whole host of other products which dramatically improved strength, durability, flexibility, and resistance to high temperatures, along with numerous other beneficial properties. Only years later were the many devastating consequences of worker exposure to asbestos at every step of the product life cycle fully understood. Then, our parents and grandparents next began the long, arduous process of removing asbestos from each of those products and at countless existing installations, ... a process that continues to this day.

In a 10-year study (1996 to 2006) sponsored by the U.S. Department of Energy, over 10,000 pulmonary (lung) function tests and chest X-rays were given to current and former workers. The percentage of workers with chest X-ray findings of asbestosis or silicosis ranged from 11.7% to 38.8%, depending on the trade, and more than 40% had abnormal pulmonary function tests (PFTs). The prevalence of abnormal chest X-rays or PFTs increased with age and years worked. For workers over age 65, 27% had an abnormal chest X-ray and 55% had abnormal PFTs. (source: U.S. – D.O.E.)

While silica and asbestos are clearly two completely different substances, there certainly are many similarities in terms of the negative consequences from an exposed worker health perspective. One key difference (at least for the time being) is that we can't take silica back out of many products in a municipal work environment because it is an essential ingredient. Thus, the charge for our generation is to do a much better job of managing worker exposure on those specific occasions where exposure to the silica dust particles can occur.

The revised OSHA Silica Standards (Subpart Z – Toxic and Hazardous Substances in 1910 – General Industry and in 1926 – Construction Industry) have been available and subject to regulatory enforcement for several years now. Managers of municipal work activities across the U.S. have had the opportunity to assess their options allowed under these revised standards and to make some difficult decisions about how best to tackle potential silica exposure work tasks in the field, in treatment plants along with

a variety other routine public sector maintenance activities. Of course, these new safety and health standards apply only to the very smallest of the silica particles that can be generated by disturbing asphalt, concrete, mortar and other similar products that contain silica. The individual particle sizes (referred to as “respirable”) covered by Subpart Z are way too small to even be seen by the naked eye. In addition, the allowable amount of these smallest silica particles that municipal workers can be exposed to (called the “Permissible Exposure Limit” or PEL) over an eight (8) hour period must average out to less than 50 micrograms per cubic meter of air. By way of comparison, a single over-the-counter Tylenol tablet crushed into powder would be 500 milligrams, which would be the same amount as 500,000 micrograms. Thus, getting almost any municipal work accomplished which requires disturbing asphalt, concrete and other silica containing materials while keeping exposure under 50 micrograms over eight hours is no small feat!

On the other hand, OSHA realizes that municipalities still have to accomplish these many and varied types of silica disturbing work activities on a daily basis. One strategy allowed by the OSHA standards is to develop a specific approach for every different work activity that municipal employees must use each time and is referred to as the “Scheduled Monitoring” option, per 1926.1153(d)(2)(iii) and 1910.1053(d)(3). Specially designed municipal tools and equipment which have been previously tested and proven (usually with the assistance of industrial hygienists) to authoritatively demonstrate that employee exposure remains under the PEL of 50 micrograms, ... or hopefully much less. Any measurement above 25 micrograms (which is the “Action Level” or AL) requires ongoing testing of exposure levels on a periodic basis. After exhausting all other strategies to further reduce the measured silica dust, if the resulting dust content is still above 50 micrograms, respiratory protection of employees including establishment of a respiratory protection program would be required.

A second strategy for achieving compliance with the OSHA silica standards is to utilize equipment for which

such testing has already been completed (e.g. by the manufacturer / independent testing labs, etc.) and determined to be below the AL (25 micrograms) which is referred to as the “Performance Option” per 1926.1153(d)(2)(ii) and 1910.1053(d)(2)

A third strategy for achieving compliance with the OSHA silica standards is allowed through utilization of any of the 18 pieces of silica disturbing tools and equipment listed in the OSHA Subpart Z – Construction Standard – 1926.1153 Table 1. The OSHA general industry version of the silica standard does not contain a similar table. But, particular maintenance activities where the tools and conditions of use would be identical to those which are typically used by contractors does allow the use of Table 1 for maintenance work that would otherwise clearly fall under the OSHA 1910 General Industry standards. If the use of these specific 18 tools and equipment precisely follow the conditions for use as described in Table 1, the municipal employer will be considered to be in compliance with the silica standards whether or not the actual silica dust level on-site is above or below the AL or PEL.

The paragraphs above only provide a basic overview of some of the basic strategies for achieving compliance by municipalities. The original sources of regulatory authority – the OSHA standards, must be consulted directly to fully understand the compliance options and alternatives that apply to the unique combination of challenges that exist in your municipality’s specific work environment(s). Plus, a great deal of training must be provided by the municipal employer to ensure their employees understand whatever specific approaches to performing work that the municipality has identified as the approved method for achieving compliance with the variety of tools and equipment to be utilized. There is also a mandated elaborate annual health screening and testing regimen that must be provided by the employer at no cost to each employee who must utilize respirators on potential silica exposure activities on 50 (or more) occasions in a one-year period.

With this brief overview on some of the basic tenets on the silica standards, here are a few questions to consider as you strive to continue improving your silica safety and health program.

1) What should you (or any of your employees) do when they observe contractors’ employees perhaps even performing work for the municipality who are clearly not utilizing any of the strategies for achieving silica exposure compliance outlined above?

2) For municipalities who are seeking to comply with the silica regulations through utilization of the tools and equipment set forth in Table 1, if silica dust is still being produced at levels that are clearly visible, what are the long-term liability and health cost implications for the municipality?

3) Since the use of respiratory protection PPE (e.g. respirators) is only allowed by the OSHA regulations as a “last resort,” (i.e. not even a choice to be considered until all other strategies for silica exposure reduction have been implemented) ... with new safety tools and equipment becoming available on a continuous basis, are there now any other approaches or technology for performing certain potential silica exposure activities which could eliminate the need for respirators? ... or could serve to reduce the potential silica exposure levels and thereby allow a reduction in the level of respiratory filtration protection required?

4) After decades of working together on countless projects, sitting together suffering through too many required City/Town meetings to even count, for many of your co-workers you probably already know their spouse’s name, how many children they have, along with other personal details. Years from now, around the time you retire or in the years immediately thereafter, when you casually encounter a fellow co-worker at the grocery store, at a religious event, watching a holiday parade with your family, etc., ... what will you say when they inform you that they have been recently diagnosed with emphysema, COPD, tuberculosis, chronic kidney failure, lung cancer, etc. that you both know could likely be a direct result of exposure to silica while working together on the job those many years?

Apart from moral, ethical and regulatory motivations to achieve or exceed compliance with potential silica dust exposures for the protection of your fellow workers, there are now additional ample financial incentives, as shown below. Please note that the cost of any subsequent potential civil litigation settlement (class action or other) against the municipality would be in addition to these OSHA penalties. Remember

also that any punitive damages awarded through this legal process might not be covered under the municipality's general liability insurance policy.

Below are the OSHA maximum penalty amounts, with the annual adjustment for inflation, that may be assessed after Jan. 15, 2023. (See OSHA Memo, Dec. 20, 2022).

Type of Violation	Penalty
Serious Other-Than-Serious Posting Requirements	\$15,625 per violation
Failure to Abate	\$15,625 per day beyond the abatement date
Willful or Repeated	\$156,259 per violation

If you are a member of municipal management, (crew leader, department level, member of a safety committee / team, risk manager, etc.) this is the time for you to step-up. Don't strive to MEET the OSHA regulatory requirements related to silica. Instead, insist on EXCEEDING OSHA's minimum safety and health standards in a way that will be clearly understood by everybody (e.g. Table 1, plus extra effort - additional sprayers, HEPA vacuums, ... etc. as necessary, such that no visible dust is tolerated on-site in almost every situation, etc.) One piece of good news is that there are so many new tools and equipment to help you achieve this goal which weren't even available in years past. At the very least, do what you can to make it better / safer / healthier for the next generation of municipal workers who are coming after you. Each work environment can present unique combinations of challenges in protecting employees from potentially dangerous levels of silica exposure. Yet, other public sector employers, along with many contracting companies, etc. are already finding ways to get this done.

Biden-Harris Administration Awards \$110 Million in Grants to Improve Safety on America's Roadways by Preventing Deadly Wildlife-Vehicle Crashes

The Biden-Harris Administration has granted \$110 million for 19 wildlife crossing projects in 17 states, aiming to reduce collisions on U.S. roads that cause injuries, fatalities, and over \$10 billion in costs. The grants, part of the Bipartisan Infrastructure Law, support initiatives like wildlife crossings and fencing. U.S. Transportation Secretary Pete Buttigieg highlighted the importance of these grants in saving lives, especially in rural areas. The projects align with the goal of achieving zero roadway deaths and serious injuries.

[Click Here to Learn More!](#)



What's Wrong With This Picture?

Can you tell what's wrong with this picture? See answer on page 10.

New Statue Honors NC State Basketball Great

THE NEWEST STATUE OUTSIDE OF REYNOLDS COLISEUM HONORS FORMER MEN'S BASKETBALL STANDOUT AND NATIONAL CHAMPION DAVID THOMPSON.

Reprinted from NC State News and Written by Tim Peeler

When David Thompson was a freshman at NC State in 1971, the Guinness Book of World Records came to Reynolds Coliseum to measure a vital statistic few people at that time ever talked about: something called a “vertical leap.”

Officials measured his standing jump at 42 inches, a number so remarkable that it remained in the annual list of global achievements even after he surpassed it several times during his Wolfpack basketball (and brief track and field) career.

By the time Thompson left, with three ACC Player of the Year Awards, three All-America certificates, two national Player of the Year Awards, two ACC Championships and the school's first team national championship, he could elevate a full 44 inches from a standing jump — a number that matched the one on Thompson's jersey.

On Wednesday, Dec. 6, NC State unveiled a statue to honor Thompson nearly a half century after his playing career ended, making him the second former student-athlete and graduate and the first African American to have a statue erected on campus in his honor. Thompson's coach, Norman Sloan, was a three-sport letterman at State and the first athlete and graduate recognized with a statue, which stands as part of the Coaches Corner next to Reynolds with Kay Yow, Everett Case and Jim Valvano.

“The four years I spent at NC State were the best of my life,” said Thompson, surrounded by teammates, family and a throng of supporters, donors and alumni who attended the event just outside Reynolds Coliseum.

Besides being placed 44 inches off the ground, the details of the statue, created by sculptor David Alan Clark of Wyoming, have a perfect 1970s flair: canvas Converse tennis shoes, two-stripe socks pulled up over the calves, sweatbands on each wrist, the single word “State” on the front of the jersey and just enough of a frizzy hairstyle to represent his generation.

Viewed at the proper angle, it appears the statue might be aiming to dunk the ball into the Technology Tower at the end of Talley Student Union more than 100 yards away. If anyone was capable of doing so, it was Thompson.



A large crowd gathers around and admires the new statue of David Thompson.

It was an emotional day for the youngest child of a family from the Cleveland County town of Boiling Springs, where Thompson grew up with seven sisters, three brothers and one bathroom. The only time the former Crest High School star teared up at the unveiling was when he talked about his parents, Vellie and Ida Thompson.

“My mom and dad would really be proud of this,” Thompson said.

After his playing career was over and he served as an ambassador for the NBA's Charlotte Hornets, Thompson re-enrolled at NC State at the age of 49 to complete his degree in sociology in 2003. He received his diploma at the same winter commencement as his oldest daughter, Ericka, who received an NC State degree in arts applications, and a week ahead of youngest daughter Brooke, who received sociology and psychology degrees from UNC-Asheville.

The day of the unveiling belonged to Thompson, just a few hours before this year's Wolfpack team played its annual heritage game at Reynolds Coliseum, where Thompson played all of his home games. He and his teammates will gather again in February to celebrate the 50th anniversary of the 1974 NCAA Championship, which capped off a two-season run in which head coach Norm Sloan's team compiled a 57-1 record, a feat that has never been repeated.

While it was a team reunion with assistant coach Eddie Biedenbach and players like Tom Burleson, Phil Spence, Mark Moeller, Craig Kuzmaul and others, perhaps the greatest testament to Thompson's lasting legacy was the attendance and participation of those who had been some of Thompson's fiercest opponents.

"He was unique, he was one of a kind," said fellow Hall of Fame inductee Bill Walton, in an NC State athletics video. "He was a comet that came through our universe one time.

"There is only one David Thompson."

NBA legend Michael Jordan, who chose Thompson to introduce him at his own Hall of Fame induction, said simply: "I was inspired by him."

Former All-Americans Barry Parkhill of Virginia and Phil Ford of North Carolina attended the statue unveiling, as did other NC State superstars such as football All-American Torry Holt, women's basketball star Chasity Melvin and members of the 1983 NCAA championship team.

And Thompson gave a special shoutout to his niece, Charlotte Smith, who helped the UNC-Chapel Hill women's basketball team win the 1994 NCAA championship.

After the ceremony, Thompson spoke at a press conference, gave an interview to a documentary film crew and prepared to attend one more instance of the sporting event that made him famous: a men's basketball game at Reynolds Coliseum.



David Thompson and other attendees watch as a new statue in his likeness is unveiled next to Reynolds Coliseum.

National 211 Day

Sunday, February 11th is National 211 Day, which celebrates the go-to resource that connects people to help for immediate or long-term challenges, such as housing and utility assistance, food, healthcare, transportation, and more. United Way's NC 211 is commemorating this holiday by celebrating their team's achievements and imagining the future.

[Click here for more information!](#)

Rural Road Safety Resources: 5 Great Sites for Funding

The National Center for Rural Road Safety has published a resource including five resources that can be used to gather funding for road safety improvements in rural areas. These resources are specifically for funding rural areas!

[Click Here for the Resources!](#)

North Carolina Transportation Innovation Council Accepting Funding Applications

The FHWA State Transportation Innovation Council (STIC) program aims to foster innovation, provide financial support for projects improving transportation efficiency, safety, and sustainability in North Carolina. We encourage you to explore potential projects that could benefit our state, as NCDOT's participation in this funding opportunity can have a lasting impact. The CLEAR Program will be hosting a Lunch and Learn on Wednesday, March 20 – [register today!](#) Funding applications will be accepted February 19 – April 15, 2024. You can also visit the [North Carolina Transportation Innovation Council \(NC-TIC\)](#) website for more details about the application process and see information on successful projects.

Construction Math

Aiden Lewis

Construction Math is back! In this full day course, expect to tackle all sorts of math that can be used in your everyday life. There will be calculations, measurements, rounding, estimating, area, volume, unit conversions, and more. Throughout the class, examples of work sites, home life, and travel will be used to relate abstract topics to real scenarios. Trying to figure out how much coffee to put in the machine to brew a half pot? It's Math! Need to make a cost estimate for a project or even just a single set of materials? It's Math! Wondering how much gas it'll take to drive 1.5 hours down I-40? It's Math!

Our everyday life can be made easier if mathematical tools are utilized, and the only way to do that is to learn and practice them. After Construction Math, you can expect to confidently use those tools for various jobs or just quick mental calculations. The class will contain lectures, visuals, collaborative work, individual work, and group discussion. We cannot avoid math if we want to do a good, precise job at work. The basics covered in class will set students up for success in the future when dealing with math, and the more advanced topics will allow students to excel when faced with more difficult problems.

With Construction Math, prepare to speak the universal language – Math! Starting from the basics all the way up to multi-step conversions and calculations, the class will prepare students to utilize math in their work. After the full day class, the anxiety about dealing with calculations will be gone and it will be replaced by the confidence to give accurate answers and reports.

The Civil Engineering PE Exam is changing in April 2024!

NCEES is ending the breadth/depth aspect of the Civil PE Exam – starting in April 2024, there will no longer be a common morning/breadth portion. Each of the five disciplines will be different exams. As an example, only transportation discipline examinees will have any transportation questions (everyone else will not have any, but some disciplines will still have overlap). If you have any questions, please let me know. The Institute for Transportation Research and Education has been providing PE exam review courses for 40 years and we're working to continue to provide an effective course to help you pass the exam.

Brief video explaining the change: https://youtu.be/W2fLZN3uzM8?si=bH4KgCqjtc_AoJGp

The updated specifications are available here: <https://ncees.org/exams/pe-exam/civil/>

More Flexibility for Local Federal-aid Projects

FHWA published guidance regarding provisions contained in the Bipartisan Infrastructure Law (BIL) that provide additional design flexibility to local jurisdictions developing Federal-aid projects on roadways under their ownership.

The guidance outlines the flexibility available for NHS and non-NHS projects and links to a website listing alternate roadway design publications that have been recognized by FHWA.

[Click Here for More Information!](#)

Narrow Lanes Save Lives

With many cities across the US growing and expanding, there is a growing need for safer walking and biking lanes. The solution: narrowing car lanes. Click below to view a dynamic presentation showcasing the benefits of narrowing lanes.

[Click Here for More Information!](#)

OSHA Now Prefers Safety Helmets over Hard Hats

OSHA is replacing traditional hard hats with modern safety helmets to better protect workers from head injuries. These helmets offer improved side impact protection and come with features like chin straps and vents. OSHA recommends their use in various work environments to reduce the risk of head injuries, which can incur significant costs. Standards for protective headgear ensure compliance and effectiveness, emphasizing regular inspection and replacement when necessary.

[Click Here to Learn More!](#)

Congratulations from NC LTAP to all of the North Carolina Awardees of Safe Streets for All Grants!

This year, grants were awarded to 16 municipalities and organizations for a total amount of over \$4.2 million. These grants will be used for a wide variety of projects ranging from the development of comprehensive safety action plans and further safety guidelines to identifying issues within current street designs and piloting new demonstration activities.

Please join us in congratulating the fine folks who worked to make this possible at the following municipalities and organizations:

- Burlington–Graham MPO
- City of Gastonia
- City of Greensboro
- City of Hickory
- City of Monroe
- Foothills Regional Commission
- Greenville Urban Area MPO
- Piedmont Triad Regional Council
- Southwestern Commission
- Town of Apex
- Town of Benson
- Town of Chapel Hill
- Town of Elizabethtown
- Town of Waxhaw
- Village of Clemmons
- Wilmington Urban Area MPO



TRIP Report: Increases in North Carolina Freight Movement by 2050 Among the Highest in the US

A new report by transportation research nonprofit TRIP reveals that the value of freight shipped in North Carolina in 2022 was \$741 billion, ranking 13th among all states. From 2022 to 2050, freight movement in the state is projected to increase by 64% in weight and 97% in value, marking the 15th highest anticipated growth in the U.S. The report emphasizes the critical role of a well-maintained, efficient, and safe transportation network for the state’s economic health. It also highlights challenges such as traffic congestion, increased operational costs, and rising logistics expenses, recommending investments to improve safety, efficiency, and capacity in North Carolina’s freight transportation system.

[Click here for more information!](#)

Biden–Harris Administration Announces \$645 million to Help Meet Rural Transportation and Mobility Needs

The Biden–Harris Administration has allocated \$645.3 million in the second year of the Rural Surface Transportation Grant Program to fund 18 projects improving transportation in rural areas. These projects, focusing on safety, accessibility, and connectivity, include rail crossing improvements in Georgia, corridor enhancements in New Mexico, microtransit services expansion in Oklahoma, and road improvements in Northern Maine. The Rural Program, part of the Bipartisan Infrastructure Law, aims to address challenges in rural transportation, with a total funding of approximately \$2 billion through 2026.

[Click Here to Learn More!](#)

Tailgate Talk

Cold Weather Precautions



This Everyday Safety Tailgate Talk was originally published as the January 2016 “Safety Pins” by Philip E. Spiezio, Safety Officer, Washington County Office of the Safety Officer

The four environmental conditions that cause cold-related stress are low temperatures, wind, dampness, and cold water. Two or more of these conditions together can make working outdoors very dangerous.

Here are a few tips to keep in mind when working outdoors in cold weather:

- Wear appropriate protective clothing—Dress in layers
- When working outside in the winter it is very important that you dress appropriately. When dressing for outside work, think of the THREE W's when building your layers, WICKING, WARMING and WEATHER.

The first layer should be a WICKING Layer that will draw moisture away from your body. Use synthetic base layers with a wicking apparel to draw sweat away from your body.

The second layer should be a WARMING Layer. This layer should be your insulation. Select wool, fleece or multiple flannel shirts to insulate yourself from the cold and trap air that will be warmed by your body heat. You can then remove pieces of the warming layer as needed.

The third layer should be your WEATHER Layer. Select a garment that will provide additional warmth and protect you from the snow, rain and wind. The Weather Layer should not absorb moisture.

Pay special attention to protecting your feet, hands, face and head. Up to 40 percent of your body heat can be lost when your head is not protected properly.

- Eat high calorie foods and drink liquids that do not contain caffeine or alcohol when working outside in cold temperatures. Proper hydration is a must. Even though it is cold continue to hydrate and drink plenty of water.

Take frequent short breaks, avoid exhaustion or fatigue as energy is needed to keep your body warm as well.

- When possible, work during the warmest part of the day.
- Work in pairs, when the weather is very cold and windy.
- Seek warmth when you first start to feel the early signs of your body getting cold.
- Keep in mind that even at 10 degrees with a wind speed of twenty miles per hour— exposed skin can freeze in as little time as 1 minute.

Everyday Safety Tailgate Talks are published by the Cornell Local Roads Program in cooperation with the National Local Technical Assistance Association and participating partner organizations.

Resources and References:

American Red Cross Top Ten Cold Weather Safety Tips <http://www.redcross.org/news/article/Top-Ten-Red-Cross-Cold-Weather-Safety-Tips>

National Weather Service “Prepare for Cold Weather” Webpage URL <http://www.nws.noaa.gov/os/cold/before.shtml>

OSHA Cold Stress Guide <https://www.osha.gov/SLTC/emergencypreparedness/guides/cold.html>



What's Wrong With This Picture?

Craig Baird

This is a picture of a work zone I encountered during a recent travel adventure in North Carolina. It is on a divided two-lane roadway where the right lane is temporarily closed due to some road maintenance that is ahead. As you can see, all traffic is merging into the left lane. The normal posted speed limit was sixty-five miles per hour, but due to this "Work Zone" construction, the speed limit was temporarily reduced to sixty miles per hour. And yes, there were additional flashing signs and lighted message boards stating, "Work Zone Ahead." "Speed Limit 60" and don't forget, "\$250 Fines" for speeding! That sign sure will get your attention!



Even with all the advance warning signs and work zone safety equipment in place, motorists should keep their "in car distractions" to a minimum and focus on the road ahead. Especially when there may be changing driving conditions. As you can see in the picture, the traffic pattern is changing! The lighted arrow board and traffic safety barrels are physically alerting the motorists and guiding them to merge into the left lane of the roadway and proceed slowly and safely through the approaching work zone. This allows the work zone construction workers and contractors access to the closed lane and temporary construction area and gives them a protected work area to safely complete their work. Look closer. Notice how the safety barrels are aligned and equally spaced in the picture? This work zone visually looks good and appears to be safe for the motorist and the construction zone workers. It looks like a professionally installed and safe work zone! As a motorist, I am allowing plenty of space between my vehicle and the vehicle in front of me. Also notice there is not another vehicle, or several vehicles trying to make a last second dash around me on the right side. That is a relief!

So, do you see what's wrong with this picture? Do you see any issues that could be safety concerns? If so, please let us know. Honestly, as I traveled through this and several other work zones during my trip, I did not see anything wrong. No, I am not a highway safety expert. But, as a motorist, I recognize good work and I just want to say "Thank you" to all the work zone workers and contractors for making our roads and travel adventures safe and enjoyable!

What if public transit was like Uber? A small N.C. city ended its bus service to find out

Wilson, North Carolina, experienced a surge in public transit ridership after switching to an on-demand system powered by a smartphone app in September 2020. The microtransit model, operated by Via, has become a model for smaller communities seeking flexible and responsive transportation solutions. Wilson secured grants for this successful initiative, attracting competition from other areas. While praised for overcoming the stigma of public transportation in small towns, sustaining the microtransit pilot program will require ongoing funding solutions. Despite its success, there's a possibility of a partial return to a fixed-route system in the future, guided by data and a commitment to efficiency. ITRE was able to be part of this project and one of our staff was included in the article!

[For more details, click here!](#)

New planning dashboard shows development trends across Durham

Durham has introduced a comprehensive planning dashboard, an interactive website aimed at providing diverse data on development. The dashboard includes overall trend data, population and demographic information, and an interactive map with tools to track development cases, past approvals, and research data for land parcels. City-County Planning Director Sara Young emphasizes the collaborative effort behind the dashboard, designed to inform the community about development projects and their potential impact. The dashboard also delves into departmental work groups, covering various planning functions, and offers weekly newsletters to keep the community engaged and informed about upcoming public hearings and meetings.

[Click Here to Learn More!](#)

NC LTAP News & Updates

To update your mail information, add a colleague to the database, or obtain information about Roads Scholar Program complete the form online at go.ncsu.edu/ncltapcontactform.



For more special offers and news, like us on [Facebook](#) and follow us on [Twitter](#).

Your Name _____

Company/Organization _____

Address _____

City _____ **State** _____ **Zip** _____

Phone _____

Check Appropriate Items

- Add/Update email information to NCLTAP listserv NCTROADS
- Send information about Roads Scholar program
- Send schedule of training opportunities

NCTROADS Listserv

Subscribe to the NC LTAP listserv. It is free and easy. Send a message to kbdaviso@ncsu.edu or call Kate Davison at 919-515-3983 and ask to be added to NCTROADS.

This is an informal network for the exchange of news about current research, discussion of problems and solutions, request for advice and assistance, and announcements of upcoming conferences, events and training opportunities for transportation personnel. Once you are subscribed, you can send a message all the listserv members at NCTROADS@lists.ncsu.edu

NC Local Technical Assistance Program Feburary–April 2024 Schedule

For Online Registration see calendar at: <https://itre.ncsu.edu/training/ltap-training/>

Questions or Email Registration: wewoods@ncsu.edu or kbdaviso@ncsu.edu

Date	Class Title	RS/ARS/MRS	Cost	Location	To Sign Up
February 22, 2024	Work Zone Traffic Control Supervisor Recertification	ARS	\$175	Raleigh	Click Here
February 27-29, 2024	Fundamentals of Government	MRS	\$150	ONLINE	Click Here
March 4, 2024	Asphalt Pavement Maintenance	RS	\$150	ONLINE	Click Here
March 5, 2024	Maintenance and Repair of Utility Cuts	RS	\$100	Raleigh	Click Here
March 5-7, 2024 1-3pm	Effective Leadership Skills	MRS	\$150	ONLINE	Click Here
March 13, 2024	Basic Drainage/Roadway Drainage Maintenance	RS	\$150	Raleigh	Click Here
March 14, 2024	Flagger Training	RS	\$150	Raleigh	Click Here
March 14, 2024 9-12pm	Fundamentals of Government	MRS	\$150	ONLINE	Click Here
March 18, 2024	Trenching Competent Person and Hands-On Soil Classification	ARS	\$175	Havelock	Click Here
March 19, 2024	Chainsaw Safety	RS	\$100	Charlotte	Click Here
March 20, 2024	Managing Conflict with the Public and Employees	RS	\$150	Raleigh	Click Here
March 21, 2024	Soils Fundamentals	RS	\$150	Raleigh	Click Here
March 25-27, 2024	Work Zone Traffic Control Supervisor	ARS	\$450	Raleigh	Click Here
April 2-4, 2024 9-11am	Designing Pedestrian Facilities for Accessibility	ARS	\$150	ONLINE	Click Here
April 2-4, 2024 1-3pm	How to Keep Yourself and Your Agency Out of Court	ARS	\$150	ONLINE	Click Here

LTAP Links on the Web

Transportation Information at your fingertips!

NC LTAP	https://itre.ncsu.edu/focus/ltap/
National LTAP/TTAP	http://www.nltapa.org/
NC Department of Transportation (NCDOT)	https://www.ncdot.gov/
Rural Road Safety Center	https://ruralsafetycenter.org/
Federal Highway Administration (FHWA)	https://www.fhwa.dot.gov/
US Department of Transportation (USDOT)	https://www.transportation.gov/
UNC School of Government	https://www.sog.unc.edu/
Institute of Transportation Engineers	http://www.ite.org/
NC Section of ITE (NCSITE)	http://ncsite.org/
APWA - NC Chapter	http://northcarolina.apwa.net/
NLTAPA Tailgate Talks	https://nltapa.org/information-exchange/nltapa-tailgate-talks/
Conversations in Transportation	https://ncsite.org/conversations



Program Staff

Kate Davison

Director
 kbdaviso@ncsu.edu
 919-515-3983

Bill Woods

Program Coordinator
 bill_woods@ncsu.edu
 919-515-8033

Craig Bard

Instructor
 clbaird@ncsu.edu

Ray Narvaez

Program Manager
 tcnarvae@ncsu.edu

Lee Thomas

Training Specialist
 lthoma22@ncsu.edu

Savannah Wright

Student Intern
 sdwright2@ncsu.edu

Vivian Poslusny

Support Specialist
 vcporch@ncsu.edu

NC LTAP Advisory Board

Bill Bass (City of Wilson)	Joe Hummer (NCDOT)
Stephen Bolt (Charlotte Dpt. of Transp.)	Mustan Kadibhai (NCDOT)
Curtis Bradly (NCDOT)	Eric Keravuori (Summit Engineering)
Mae Bryant (City of Charlotte)	Caroline Kone (City of Hickory)
Derrick Bunn (City of Wilson)	Emily McGraw (NCDOT)
Joe Geigle (FHWA)	Edward T. Parker (FHWA/NCDOT)
Magda Holloway (Summit Engineering)	Randy Shue (City of Concord)
	Walter Stroud (Town of Cary)

Transportation Tracks is published quarterly by the North Carolina Local Technical Assistance Program at the Institute for Transportation Research and Education (ITRE) at NC State University (NC State), in cooperation with the NC Department of Transportation (NCDOT) and sponsored by the Federal Highway Administration (FHWA) through its Local Technical Assistance Program. Any opinions, findings, conclusions, or recommendations expressed herein are those of the author(s) and do not necessarily reflect the findings, policies, or procedures of ITRE, NCSU, NCDOT, or FHWA.

transportationTRACKS

NC LTAP
 ITRE at NC State University
 Centennial Campus Box 8601
 Raleigh, NC 27695-8601

www.itre.ncsu.edu

