The
READY-MIXER

Virginia Ready-Mixed Concrete Association
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NRMCA VISION
Enriching • Inspiring • Empowering

newsletter

September 2004

2004 Fall Convention at Wintergreen

President Gus Lorber and convention chair Morgan Nelson worked during the summer months to develop a program that we all enjoyed during the Fall Convention at Wintergreen. On the Sunday afternoon, both the Advisory Council and the Board of Directors met to discuss the business of the Association. The Advisory Council recommended to the Board its 2005 budget and reviewed the Council's activities over the last six months.

The Board of Directors approved both the Association's and the Council's 2005 budgets as well as a $10,000 contribution to the Virginia Aggregates Association/Virginia Road and Transportation Builders Association public relations campaign.

Industry groups are trying to raise $800,000 to $1 million to support an effort to increase highway funding. The board also preliminary tentatively approved a $10,000 fee to commission a survey on producer member company benefits and salaries. This survey will not only be statewide but will be regionalized for your area. The board felt this would be a very helpful for the membership and hoped that if it is perceived as a useful tool our companies would participate in the survey and help to support it financially in the future.

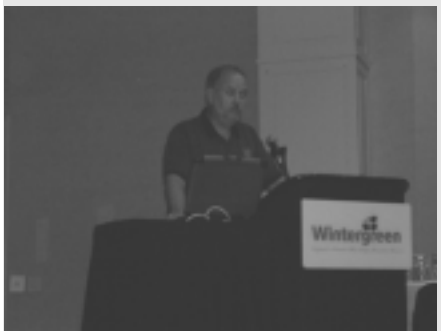
Celik Ozyildirim of the Virginia Transportation Research Council speaks on the impact of current concrete research.

The full membership held its first roundtable during one of our general sessions which provided useful operational and marketing ideas. We also heard from our Council chairmen about the projects they are working on in their marketing areas as well as listened to presentations on tilt-up, the economy and the cement shortage.

Throughout the two-and-a-half days our members experienced meaningful seminars and were able to gather and talk with their counterparts from across the state.

If you were not able to make it to the fall conference we hope you will be at Kingsmill May 15th-17th for our Spring Conference.

Karen Van Lengen, Dean of the UVA School of Architecture, speaks on issues concerning the industry educating architects.



Jack Rollison, Special Assistant to VDOT Commissioner Philip Shucet, speaks on funding and efficiency.

Comic ventriloquist Steve Brogan has some fun with Ray Whelahan of Lafarge North America.

Mixer Truck Roadeo November 10th

VRMCA will host a Mixer Truck Driving Roadeo on Wednesday, November 10 at the NASCAR Raceway in Richmond.
The event will begin at 10:00 am and will conclude at approximately 2:00 pm. Lunch will be served.

- Drivers, limited to two per company will undergo a written test, a pre-trip inspection monitored by the State Police Motor Carrier offices and will have to drive a mixer truck through an obstacle course. Standard tandem axle trucks will be furnished.

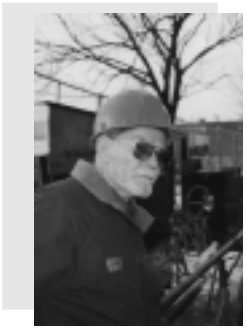
The winning driver will receive a $500 cash prize and the runner-up will receive $250. In addition, the winner will receive a complimentary trip to the spring convention where a carved model of a mixer truck will be presented.

- Registration forms and an outline of the course will be mailed shortly, so please give thought to choosing two drivers to represent your company. The fee is only $25 per driver.
- It is hoped that this event and its publicity will urge drivers and the public to focus on the safety initiatives of the ready mixed industry.

In Memoriam: Mr. James "Mac" McWhorter, Jr.

JAMES MCWHORTER JR., 80, of 3813 Danbury Court, Woodbridge, VA died Saturday, September 4, 2004, at his home.

Mr. McWhorter worked with the U.S. Army Corps of Engineers, Mobile District, Mobile, AL and later with Otto C. Frey (the first president of ACI) in the construction of the Gaylite aggregate plant in Rockmart, Georgia. In 1961, he joined Solite Corporation of VA and Northeast Solite Corporation of Saugerties, NY and remained in their employ for nearly fifty years. Mr. McWhorter was a long time supporter of, and expert in, the lightweight aggregate industry.



"Mac", well known on construction sites for his "hands-on" expertise, was an integral part in the collection of the technical data that is used today throughout the concrete related industries. He continued to be active in this research until his demise.

Mr. McWhorter was an Eagle Scout and attended the University of Kentucky. He was a decorated World War II combat veteran with the U.S. Army Amphibious Engineers in the Pacific and a lifetime member of both the American Legion and the VFW. His wife, the former Gwen Wilson; a son, James Steven McWhorter; two grandchildren, James Steven, Jr. and Rebecca Lynn; and 4 great-grandchildren and one brother, the Reverend D.F. McWhorter, survive him.

On September 16th, 2004, a memorial service is being held in Buchanon City Cemetery, Buchanon, GA for the interment of his ashes. His brother will present his eulogy.

In lieu of flowers, the McWhorter family requests that friends and colleagues kindly consider donations to Capital Hospice, 9300 Lee Highway, Suite 500, Fairfax, VA 22031, in Mr. McWhorter's honor and memory.

Facts About Concrete for Intersections, Bus Pads and Streets

by Scott Haislip, American Concrete Pavement Association

In a municipal road and street network, intersections are the most susceptible areas to pavement deterioration. Heavy vehicles stopping and turning can damage pavement surface severely, especially along the approaches to intersections. The pavement within the junction of an intersection also receives twice the traffic of the pavement on the approach legs. Bus pads are another area where distresses occur also because of the damage resulting from turning and stopping on flexible pavements.

Concrete payments no longer require weeks to construct . . .

Many state, city, and county agencies use concrete, but others may be hesitant to consider it because they believe it costs too much, is too difficult to repair, or takes to long to place.

The truth is concrete pavements are well-suited to handling the heavy, channelized traffic and turning movements of vehicles. Concrete does not rut, washboard, or shove, which makes it a safer, more durable pavement surface.

Lower Costs

Although concrete pavements may cost more, initially, than asphalt, there are many applications where first costs are competitive.

Concrete pavements are well-suited for handling the heavy vehicles stopping and turning can stress the pavement surface severely along the approaches to the intersection.

One reason concrete pavements are increasingly competitive is the balance of efficient design methods, combined with judicious use of features such as dowel bars, fibers, high-strength bases, joint sealant materials, lower strength concrete, etc.

Regardless of first costs, concrete is almost invariably less expensive to own because of the reduced maintenance and rehabilitation costs over the pavement's life cycle. Life-cycle cost analysis (LCCA), or the projected costs to manage an asset over its lifetime, involves the right combination of engineering judgment and economic factors to calculate the true costs of a pavement over a projected lifetime. LCCA simply projects long-term costs, and then discounts to present values.

Improved paving methods and materials result in concrete pavements that offer both initial and long-term cost advantages.

Open to Traffic in Hours

Concrete pavements no longer require weeks to construct and open to traffic. Current paving methods and materials mean that pavements can be opened sooner than the time that transpires between rush hours.

Not only does this reduce construction time, it also reduces congestion and could help reduce the more than 100,000 work-zone accidents that occur in the United States each year.

Processes such as fast-track technology, which uses high early-strength cement and accelerating admixtures, can allow concrete pavements to be opened in four hours or less. Also, because concrete pavements require only one pass of the paver or screed, instead of having to build up the pavement in multiple layers, the construction time is often much less than asphalt materials.

Construction Under Traffic

In addition to opening to traffic sooner, the concrete pavement industry has developed strategies for managing traffic through construction work zones.

There are a range of strategies to help owners and contractors construct city and county streets under traffic.

Ease of Repair

All pavements, regardless of type, will eventually require repair. Concrete pavements can be repaired easily with readily available equipment and materials. Experience has shown that it's best to repair concrete with concrete. Full-depth concrete repairs provide a permanently smooth transition that can withstand traffic loads without settlement or deformation.

Many pavements will also need to be cut for installing or repairing utilities. Utility repairs in concrete pavements require few simple steps. After the site of the utility upgrade or repair is determined, the pavement section is removed. Next, the utility upgrade or repair is performed, and then the subgrade is replaced and prepared for a concrete pavement patch. The patch is placed, finished, and cured, and then opened to traffic. The entire process can be considerably shorter than many thought was possible — often within a day or two, depending on how long the utility fix requires. To learn more about utility cuts in concrete, read "Tech Tip: Addressing the Misperception of Utility Cuts <#5>."

The concrete pavement industry continues to make improvements in its processes and products for municipal and county streets and roads. To learn more, contact Scott Haislip (shaislip@pavement.com, 847-966-2272).

Why Tilt–Up Concrete?

Article by: Hessam Nabavi, R.A.
Northern Virginia Director of Industry Services
Virginia Ready Mixed Concrete Advisory Council

"WHY TILT-UP" is a question that I have often been asked from architects and school systems. It is an interesting question. When I talk to architects about tilt-up concrete, I always like to remind them about our training in the school of architecture. As everyone who has ever studied architecture remembers, one of the ways we used to make models for our projects was to take a piece of foam core board, draw the elevation on the board, cut the board according to the measurements, punch the doors and windows and then Tilt It Up. That is how we used to build models, and tilt-up building is done exactly the same way, except panels are made of concrete not foam core board and they are lifted by cranes instead of students. When we look at the tilt-up system it makes sense. Architect Glen Stephens suggests 10 reasons why architects should be evaluating tilt-up for their next projects, especially for school projects.

- Tilt-up concrete construction saves time.
- Tilt-up concrete construction saves money.
- Tilt-up concrete allows buildings to have thin exterior walls.
- Tilt-up concrete panels are compatible with any structural grid.
- Tilt-up concrete construction provides architectural flexibility and advantages.
- Tilt-up concrete wall panels provide a high degree of fire rating.
- Tilt-up concrete wall panels provide a high degree of security.
- Tilt-up concrete construction offers many foundation advantages.
- Tilt-up concrete wall panels allow for higher clear heights without significant cost consideration.
- Tilt-up concrete wall panels have long life cycle savings.

In addition to the above reasons, we also can suggest the following benefits.

Tilt-Up Concrete workers construct a building in Northern Virginia.

1). Tilt-up concrete building offers more building for the money and has a higher resale value.

2). Tilt-up concrete building offers energy efficiency and green building benefits.

3). Tilt-up concrete building offers durability and inherent force protection.

The August 23rd issue of ENR had an article on Hurricane Charley and the resulting damage. On page nine, the following was written:

In Punta Gorda, every school suffered extensive damage—except for the 900 student Sallie Jones Elementary School, a two-story, 98,000-sq-ft, tilt-up concrete structure with metal roof, steel floor and roof framing. Reynolds, Smith and Hills, Inc., South Jacksonville, Florida, designed it in 2001 to meet the standard of 120 mph wind load. An additional "importance factor" of 1.15 resulted in a structural design load of 138 mph for wind.

Contractor Owen-Ames-Kimball Co., Fort Myers, Florida, completed the school in 2003. It has a two-story central core with single-story wings running alongside, says Reynolds architect Charlie Gutekunst. "That profile is less of a hard edge for the winds to deal with," he notes. Except for some soffit damage on the four ft overhangs, "nothing really happened to the building."

So why tilt-up? Well in Northern Virginia, not only have we teamed up with structural engineers and tilt-up contractors to promote tilt-up, we have also teamed up with design or construction directors of public schools in other states such as Florida. Some of the counties in Florida have already switched to tilt-up concrete for construction of their new schools. We feel their reasons to choose tilt-up concrete as a method of choice are very important. We have asked them to help us in our task of promoting tilt-up concrete to various school architects and public schools by writing letters which describe those reasons. We appreciate their support and patronage in this task. By the way, as a result of sending these testimonial letters to school construction decision makers, we have been receiving phone calls requesting additional information, and have been asked to conduct educational seminars for their design directors and in-house architects. The two letters of testimonial on the following pages are examples of this team effort.

See Tilt-Up Concrete Testimonials on pages 4-5.

Southwest Virginia Council Sponsors Picnic and Baseball Game

by Bob Nablo

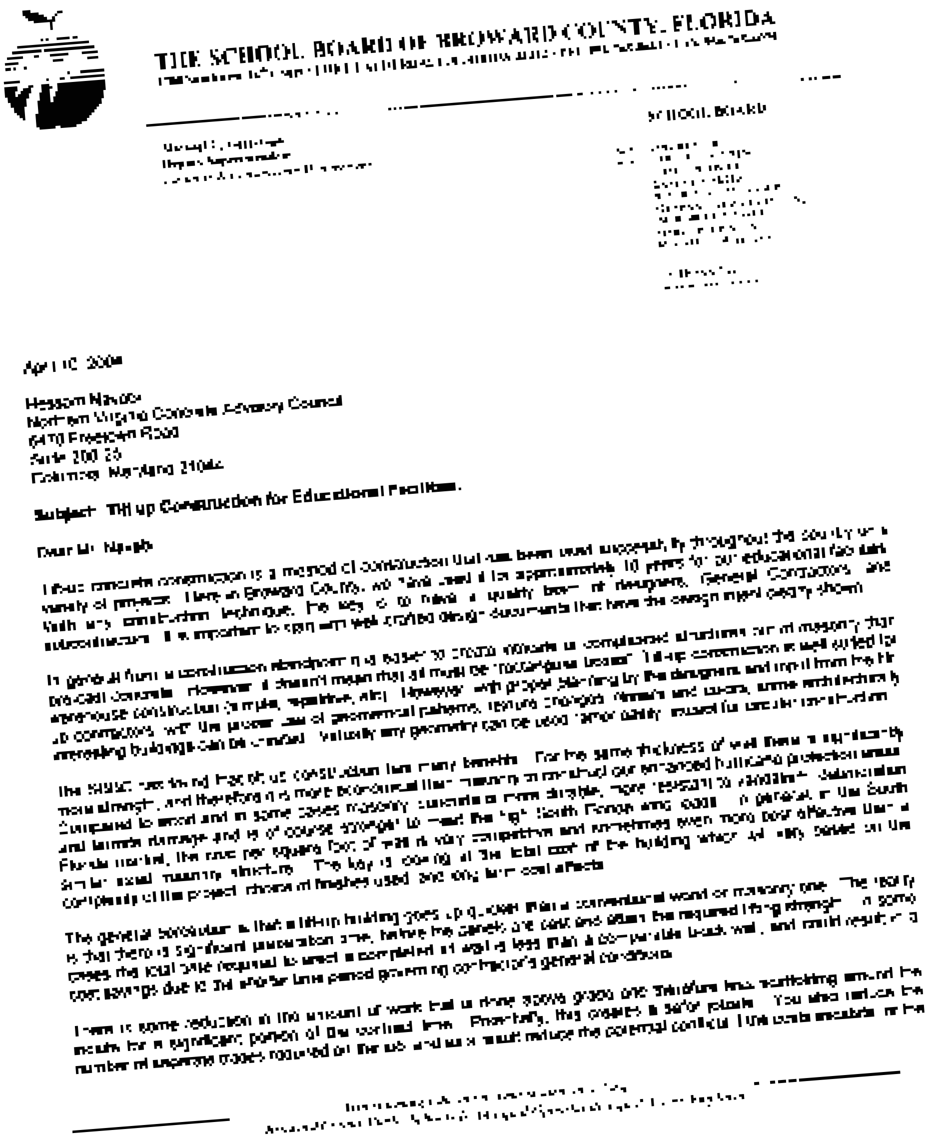
George Kuhn, Chairman of Southwest Virginia Council (from left), with sons Jeremy and Jordan, and Cindy Marek (from right) with son Luke, enjoy the afternoon's festivities.

On a very pleasant late-summer evening, the Southwest Virginia Council sponsored its first picnic and baseball game at Salem Municipal Park, home of the Salem Avalanche. Council members and guests enjoyed excellent picnic fare and a well-played professional baseball game by the Salem team, a farm club of the Houston Astros. Area architects, contractors and other ready-mixed customers were invited. Although the August 31st date held down the number of families attending, a good time was had by all. Unfortunately, the home team lost the game 5-4 in 10 innings. That only made for a more interesting game, nevertheless. Council members have decided to hold this event next year following the Hampton Council example.

Horace Thomas of Salem Ready Mix (center) and Ted Eanes, retired VRMCA member (right), unwind at the game.

Testimoni

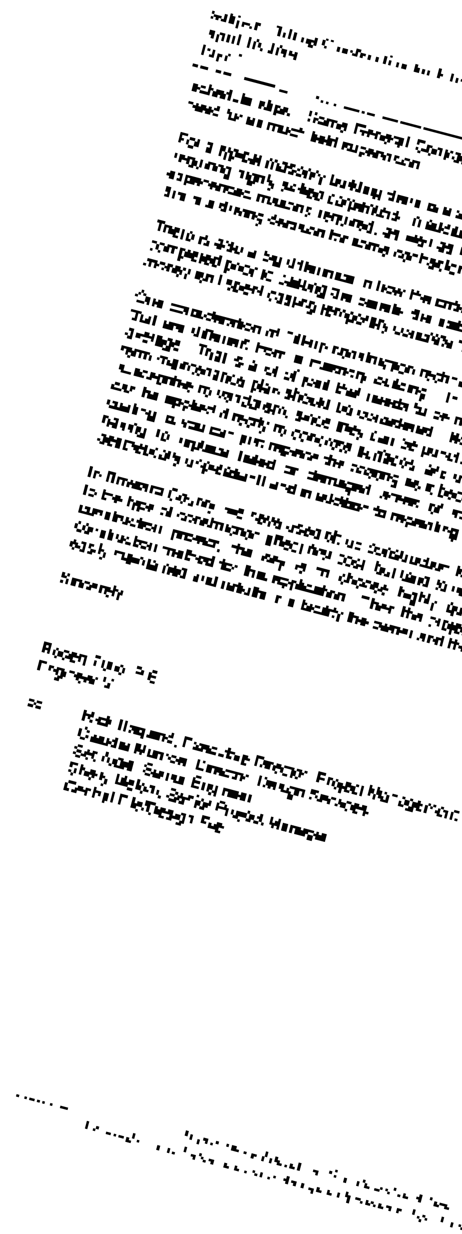
The following letters are testimonials of the benefits and values of tilt-up construction. See page three for a description of tilt-up construction and how it is now being used.



THE SCHOOL BOARD OF BROWARD COUNTY, FLORIDA

SCHOOL BOARD

Subject: Tilt up Construction for Educational Facilities.



Sincerely

"In Broward County, we have used tilt-up construction for our facilities with great success"

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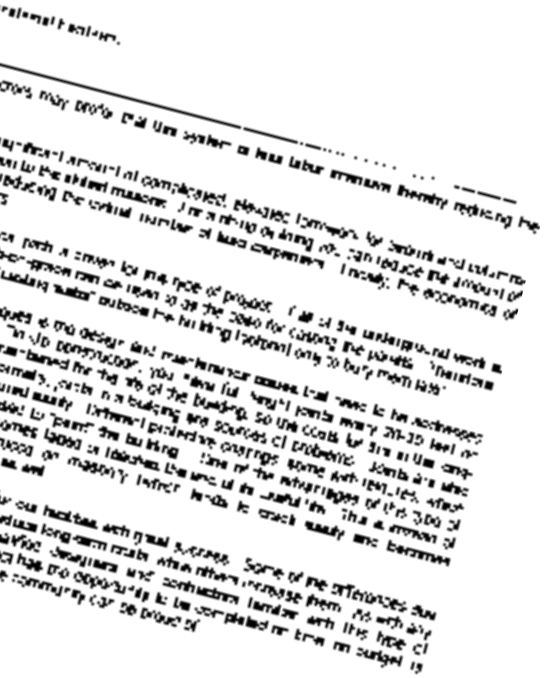

"The reinforced concrete walls easily meet those [hurricane] standards and provide a strong building envelope."

Hi Hessam,

In response to your inquiry, I would suggest the following benefits when using the "tilt up" construction method:
All layout work in performed at ground level. This translates to:
A high degree of accuracy for wall measurements and openings.
Reduced safety concerns because workpeople are not forced to work from ladders and scaffolding.
Reduced need for multiple units of lifting equipment such as fork lifts and cranes.
Time savings:
Because layout, rebar installation and concrete casting occurs at ground level the work proceeds at a faster pace than having to work vertically.
Work on several buildings can occur simultaneously.
Cost Savings:
By reducing the overall construction period, savings are realized in General Conditions.
Generally, the cost of construction is reduced.
Structural Integrity:
Our building code requires construction to hurricane standards. The reinforced concrete walls easily meet those standards and provide a strong building envelope.

In short, tilt up has been the preferred method of construction for the School District of Palm Beach County for some time.

Thomas Johns

Director of Program Management
School District of Palm Beach County

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2004 FALL CONVENTION PHOTOS

Human Resource Issues

SUPREME COURT CLARIFIES HARASSMENT PROTECTIONS FOR EMPLOYEES CLAIMING CONSTRUCTIVE DISCHARGE

by John G. Kruchko

A "constructive" discharge is really not a discharge at all. Instead, the employee resigns his or her employment and files a claim in court alleging that the employer made working conditions so intolerable that the employee was forced to resign. In such situations, depending on the size of the company, the employer may or may not know why the employee resigned. Nevertheless, the court will treat the resignation like a discharge for liability purposes so long as the employee can prove that the working conditions were objectively intolerable, i.e., that a reasonable person in the employee's position would have felt compelled to resign.

On June 14, 2004, in *Pennsylvania State Police v. Suders*, the United States Supreme Court resolved a disagreement between several federal courts of appeal on the issue of whether a constructive discharge brought about by supervisor harassment is a "tangible employment action" and therefore should preclude the assertion of the affirmative defense afforded employers in the Supreme Court's prior decisions in *Faragher v. Boca Raton* and *Burlington Industries, Inc. v. Ellerth*. In its *Ellerth and Faragher* opinions, the Court held that, where no tangible employment action was taken against the plaintiff/employee, the employer is entitled to raise an affirmative defense to liability by proving that (1) "[it] exercised reasonable care to prevent and correct promptly any sexually harassing behavior, and (2) that the plaintiff employee unreasonably failed to take advantage of any preventive or corrective opportunities provided by the employer . . . ."

> *" . . . an exit interview procedure can avoid any argument by a resigning employee that he or she felt it was necessary to immediately report the harassment and continue working . . ."*

In its *Suders* decision, the Supreme Court was reviewing an opinion by the Third Circuit Court of Appeals that a constructive discharge precipitated by workplace harassment was a "tangible employment action" which would make the employer strictly liable for the harassment under Title VII. The Supreme Court overruled the Third Circuit and held that an employer may assert the *Ellerth*/*Faragher* affirmative defense to a hostile work environment constructive discharge claim unless the plaintiff quits in reasonable response to "an employer-sanctioned adverse action officially changing her employment status or situation." The Supreme Court gave as examples "a humiliating demotion, [an] extreme cut in pay, or transfer to a position where [the employee] would face unbearable working conditions." In other words, if the employer can prove that (1) it had installed a readily accessible and effective policy for reporting and resolving complaints of harassment and (2) that the plaintiff had unreasonably failed to avail herself of the employer-provided preventive or remedial apparatus, the employer cannot be held strictly liable for the harassment which provoked the employee's resignation unless other "employer-sanctioned adverse action" was present.

In light of the Supreme Court's holding that employers may be relieved of liability if they can show that the plaintiff unreasonably failed to take advantage of available internal grievance procedures for remedying workplace harassment, employers may want to utilize an exit interview procedure for reporting workplace harassment as a supplement to any existing grievance procedure already in effect for reporting harassment during employment. Strengthening an already effective harassment policy with an exit interview procedure can avoid any argument by a resigning employee that he or she felt it was necessary to immediately quit their employment rather than report the harassment and continue working while the investigation was proceeding. Allowing an additional avenue for reporting harassment can avoid the kind of finding made by the Third Circuit in *Suders* where it ruled that summary judgment was inappropriate because "genuine issues of material fact existed concerning the effectiveness of the [employer's] program . . . to address sexual harassment claims."

A harassment policy that emphasizes the availability of a harassment reporting procedure during the exit interview process will make it even more unreasonable for a plaintiff to argue that he or she did not know about the reporting procedure or that it would have been futile to report such harassment prior to bringing a claim against the employer. Obviously, the exit interview procedure should be conducted by a human resources representative to blunt any argument by the departing employee that she was too upset by the alleged hostile environment created by her supervisor to engage in an exit interview with operations personnel. The interview should also be made available for all resignations regardless of whether they are with or without notice.

****

John G. Kruchko is a partner with the Management Labor & Employment Law Firm of Kruchko & Fries in McLean, Virginia. For more information, please contact Kruchko at (703) 734-0554 or jkruchko@kruchkoandfries.com.

Six Keys to Constructing Concrete Roundabouts

by Keith Beazley

The benefits of roundabouts contribute to their growing use across the country. Concrete roundabouts are long-lasting and easy to maintain, because concrete does not push, shove, or rut under the turning motion of heavy vehicles around the intersection.

Also known as traffic circles, rotaries, and turnarounds, roundabouts benefit traffic flow in small- and medium-sized intersections. Although building concrete roundabouts is straightforward and the joint system allows for phased construction. A few basic keys to planning and designing roundabouts include:

1. Choose the joint layout philosophy—Place joints as you would a normal intersection, or isolate the circle from the legs.

2. Preliminary joint layout—Place joints on roundabout and legs, keeping in mind maximum slab length and width. (The maximum length should be 15 ft. or 24 x T, whichever is less; maximum width should be 12 ft.)

3. Ensure all joints meet the pavement edge at 90°—Do this by doglegging joints when they come within 2-3 feet of edge.

4. Adjust joints—Adjust the locations of joints to meet manholes and drainage inlets; place isolation joints around these structures.

5. Consider the construction phasing sequence—Remember that the roundabout has to be built in some sort of sequence, so as much thought or flexibility that can be put into the plans, the better.

6. Allow further adjustment in field—Joint locations should be allowed to be adjusted slightly to accommodate changes and to allow for constructability.

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