McMahon

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News For Transportation Enthusiasts

Passages

By Joe McMahon, CEO and Chairman of the Board

Rod Plourde and Joe McMahon

More than 25 years ago, when I started McMahon Associates, I read the book *Passages*, by Gail Sheehy. The book chronicles the various stages of life.

On June 4, 2002, the book took on a double meaning for me. That day marks a major passage in both my personal life and the life of McMahon Associates.

I am honored and proud to transition the day-to-day leadership as President of McMahon Associates to my friend of 40 years, Rod Plourde. I am so happy that Rod has achieved one of his life's most cherished goals. He has earned this well-deserved honor through his life of integrity, hard work, and dedication.

As CEO and Chairman of the Board, I am entering a new passage of life. I would be less than honest if I didn't acknowledge that letting go of "my" company is fearful. However, those of you who know me well also know that my vision toward the promise of our future at McMahon is very exciting to me. I will continue to actively serve the firm with broader, big picture responsibilities.

With the naming of Joe DeSantis to the Board of Directors with Rod and I, the leadership will aim to take the firm from its current staff of 120 people to the next level of achievement. Completion of our Strategic Plan update by year's end will clarify our next steps.

Looking to the future with confidence

We are completing our plan to transition the ownership from Rod and I to a new generation (and the next) over the next 10 years. With this plan in place by fall, we will be set to achieve our strategic goal of broadening the ownership of McMahon

(continues on page 4)

National News

Wireless E9-1-1 System Planned for Better Efficiency

By Ellen C. Berry, Marketing Administrative Assistant

U.S. Transportation Secretary Norman Y. Mineta, Transportation Chief of Staff John Flaherty, and National Highway Traffic Safety Administrator Jeffrey W. Runge, M.D., are working together with telecommunications companies to implement an enhanced 9-1-1 service for cellular users.

The Enhanced 9-1-1 (E9-1-1) system will allow emergency services personnel to determine accurately from where a call originates, helping 9-1-1 dispatchers to provide quicker assistance — especially in the aftermath of September 11.

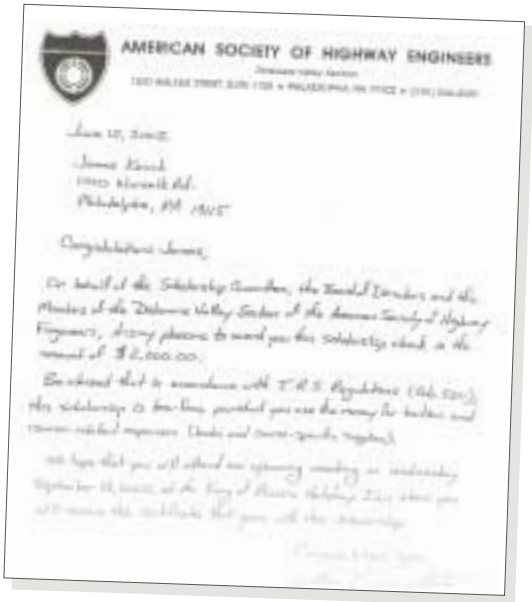
Keeping our highways safe with communications technology

Initially adopted in 1996 by the Federal Communications Commission (FCC), the E9-1-1 system consists of two phases. Phase I includes Public Safety Answering Points (PSAPs), and a mandate for wireless companies to provide PSAPs with a phone number for callback purposes and the location of the nearest cellular tower receiving the emergency call. Under Phase II, introduced in October 2001, wireless companies will need to be able to locate emergency calls and deliver requests to the PSAPs.

Because this system requires new technologies and the help of several agencies (including the Department of Transportation's Intelligent Transportation Systems Unit), the FCC developed a four-year schedule for the completion of Phase II. The entire network should be completed by December 2005. For more information, please view www.fcc.gov.

Congratulations

Student Destined for Success



AMERICAN SOCIETY OF HIGHWAY ENGINEERS

Jamie Kouch, one of McMahon's co-op employees from Drexel University, received the 2002 Scholarship Award from the Delaware Valley Section of the American Society of Highway Engineers. Nominated by McMahon Associates, Jamie's written application and interview with the Scholarship Committee earned him this honor, valued at $2,000.

Congratulations Jamie! You are an outstanding young engineer, and we are very proud to support you in achieving your engineering career goals.

McMahon Associates, Inc.
Transportation Engineers & Planners
Responsive Transportation Solutions

Our Services:

- Transportation Planning
- Traffic Impact Studies
- ITS/Traffic Signal Design
- Land Survey
- Highway & Intersection Design
- Structural Design
- Highway Access Permitting
- Construction Surveillance & Inspection

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Towamencin Township Road Design Earns Honorable Mention for Project of the Year

By John J. Mitchell, P.E., Senior Project Manager and Andrew L. Brown, P.E., Senior Project Engineer

The Towamencin Avenue Roadway Construction Project earned the 2001 Project of the Year, Honorable Mention, from the Delaware Valley Section of the American Society of Highway Engineers (ASHE) at this year's annual dinner in April. The award recognizes projects in the Delaware Valley with significant features, techniques, or innovations, and that meet budgetary and schedule requirements.

McMahon Associates provided preliminary engineering, final design, and construction services for the new roadway while working with the Towamencin Township Infrastructure Authority (TTIA).

Construction of the new $5 million Towamencin Avenue in Towamencin, Montgomery County, PA used new construction techniques and came in on budget.

An award-winning, innovative project

The need for transportation enhancements in the township's Village of Kulpsville has increased since the "Blue Route" (I-476) opened in the mid 1990's, connecting I-95 with the Northeast Extension of the Pennsylvania Turnpike (now also designated I-476). The township's Board of Supervisors developed, with the aid of professional consultants, a comprehensive proactive Transportation Master Plan so that development would be driven by planned growth and established traffic plans.

Towamencin Avenue begins at a point approximately 470 feet east of the PA Turnpike entrance at Sumneytown Pike (S.R. 63), and extends approximately 2600 feet north and east to a point opposite the intersection of Tapestry Way and Forty Foot Road (S.R. 63). Several state-of-the-art construction techniques and materials were utilized for this project, including:

- 36" diameter directional bore, 175' long at 17' depth
- Direct disposal of "HOT" material to treatment facility
- Activated charcoal filtration of hydrocarbon contaminated groundwater
- LED indications, battery backup/ generator plugs at all signals
- SUPERPAVE wearing course placed with MTV (Material Transfer Vehicle)

McMahon estimated $5 million dollars for construction. Bid in April 2001, Glasgow, Inc. submitted the winning bid proposal of $4,953,386.35 to complete the project, and the official Notice to Proceed was issued in June 2001.

Change orders for this project only totaled $917.00 (0.02 percent) of the original contract amount. Even with unforeseen conditions due to the hydrocarbon-impacted soils encountered at an existing gas station, the roadway was opened to traffic in December 2001.

New Office Opens in Cape Coral, Florida

In March 2002, McMahon Associates opened its newest office in Cape Coral, Lee County, Florida. This office was established as a result of being awarded the Fort Myers City-Wide Traffic Calming Comprehensive Plan Project, while also reinforcing our commitment to provide personalized responsive services to public and private clients, now in the western region of the state.

New Projects

Mid-Atlantic

- **Highway Occupancy Permit Review Assistance** (second consecutive contract) for PennDOT District 8-0
- **Germantown Pike Corridor Study,** Norristown, PA, for the Montgomery County Planning Commission
- **Design Management for Moderate Projects** for PennDOT District 8-0

New England Regional News

Transportation Alternatives for Boston

By Michael O. Clements, Project Manager

Boston's Anderson Regional Transportation Center in Woburn, MA was created from a Superfund site.

When the Anderson Regional Transportation Center (RTC) opened in May 2001 due to a collaborative effort among the Massachusetts Port Authority (MassPort), Massachusetts Highway Department (MassHighway), and the Massachusetts Bay Transportation Authority (MBTA), commuters benefited from all three agencies' services being made available at one location.

Transportation authorities hope to encourage daily drivers to opt to travel by train, bus, or carpool at the 34-acre RTC in Woburn, MA, which houses the Woburn Logan Express bus service, MBTA commuter rail stop, and parking for MassHighway's Park & Ride carpool lot.

According to former Massachusetts Transportation Secretary Kevin J. Sullivan, "Facilities such as this one play a major part in our efforts to encourage people to use more diverse forms of transportation during their commutes."

Transforming the site

Bill Steffens, General Manager of McMahon's New England office, led the first effort among the three largest transportation agencies in Massachusetts to transform the site into a regional transportation center when he served as Assistant General Manager of the MBTA.

The Anderson RTC site had suffered more than 100 years of industrial use and presented significant environmental challenges to be met. The Environmental Protection Agency (EPA) added the property to the Superfund National Priorities List in 1983, making the site eligible for federal funds. In developing a plan to make improvements, the EPA focused on redevelopment of the property to bring it back to productive use.

In 1998, construction of protective covers over the contaminated areas was completed and a certification report was prepared for the property. As a prerequisite to the transportation agencies purchasing the property, the EPA approved the certification report and negotiated a Prospective Purchaser Agreement with the agencies, protecting them from future Superfund liability.

The Anderson RTC site cost $10 million, split among all three transportation agencies, with the MBTA investing an additional $7 million for rail improvements.

The facility is formally named the Anderson Regional Transportation Center in memory of Jimmy Anderson, a child who suffered from leukemia and died at age 12. A dedication plaque with his image was permanently installed inside the building.

McMahon is currently involved in several Intermodal Transportation Center (ITC) projects in Massachusetts, including design and construction of an ITC in Pittsfield and Holyoke and design of a parking garage for the ITC in Brockton.

New Projects

New England

- **Pioneer Valley Intermodal Transportation Center Environmental Assessment and Joint Development Solicitation,** Holyoke, MA
- **Grand Junction Rail with Trail Feasibility Study,** City of Cambridge, MA
- **Shaws Supermarket Traffic Impact Study,** Groton, MA

Florida Regional News

Addressing Problems Facing South Florida: Part 1 — Urban Sprawl

By John S. DePalma, Associate and General Manager, and Kim D'Aprile, Administrative Assistant

Current problems facing South Florida mirror issues central to the 2003 Federal Surface Transportation Program Reauthorization. The Reauthorization, along with security and economic issues, will shape public transportation in the future, taking into account both national and local needs.

As the South Florida Regional Planning Council updates the Strategic Regional Policy Plan, the group will include results found in November 2001's Trends and Conditions Report. The study showed that issues such as quality of life (urban sprawl), security and emergency preparedness, and economic health present challenges to South Florida and the nation.

Curbing urban sprawl

A century ago, Florida's population hovered near 500,000. Today, nearly 16 million people live in the state, with a projected increase of 1.2 million more people in the next 20 years. The land, infrastructure, human resources, and natural resources have not been able to sustain that continued level of development.

Widespread development and the misallocation of resources — commonly referred to as urban sprawl — manifests itself in various infrastructure changes. Adjustments include the miles of highways, sewer systems, and drainage, accompanied by water treatment plants, schools, housing, and airports which have been developed to accommodate the population explosion.

Experts have begun to examine possible remedies to counteract the damage that sprawl inflicts on Florida's natural, and largely endangered, ecosystem. Possible solutions may include mandatory space/environmentally sensitive planning, the redevelopment of already existing inhabited land, or tougher growth management policies. By encouraging other methods of transportation and traffic management, congestion on current roadways can be managed and newly constructed highways can be avoided.

New Projects

Florida

- **General Planning Contract Extension** for FDOT District 4
- **I-95 Feasibility/ Traffic Engineering Study** for a multiuse development site in Palm City, Martin County, FL
- **Multiple Neighborhood Traffic Calming Projects** (continuing services) in Deerfield Beach, Broward County, FL

Passages *(continued from page 1)*

Associates to 10-to-20 percent of our staff.

We have not waited to start the process of expanding ownership, as we have named Gary McNaughton as an Associate of the firm. Gary, the other Associates, and Joe DeSantis as Principal leading the next generation, will acquire the majority of the firm's stock.

I learned a long time ago that to achieve greater things in life you must let go of some of the things which you have held dear. I learned this through my children, Joe and Megan, who have prospered greatly on their own.

Now, with Rod's leadership, Joe DeSantis and I, as well as the Associates and all the members of the McMahon Associates family, are ready to face the exciting challenges of the new era.

McMahon Engineer Gives Students Career Guidance

McMahon Associates realizes that young people need to be introduced to engineering as a future career possibility. Every day most of society takes for granted the infrastructure and amenities that engineering makes possible: roadways, bridges, water and sewage treatment, buildings, and environmental protection that engineers help to make possible.

Patricia M. Barr, P.E., Project Manager, presented opportunities in engineering to a science and technology class at Sun Coast High School in Palm Beach County, Fl., in March. She explained the services that a civil engineer can provide and related real-life applications of the field to the situation of Hurricane Andrew, which illustrated how engineers helped to restore South Florida.

Thank you Tricia for encouraging students toward futures that benefit all members of society.

We Answer Your Transportation Questions

McMahon in Motion will feature one reader's question on transportation in each issue. Our traffic engineers will answer your question in the following issue. Please submit your questions via e-mail to fortwashington@mcmtrans.com .

Question (from previous issue)**:** What three indicators has the FHWA identified to enhance mobility in order to offset the aging of the infrastructure?

Answer: The Federal Highway Administration (FHWA) identified three key indicators on which to focus to enhance mobility, preserve infrastructure, and offset aging: **pavement smoothness**, **bridge condition**, and **traffic flow**.

By FY 2001, SUPERPAVE-designed pavements were employed in all states. The asphalt binder technology was fully implemented by 47 states, and the mixture and volumetric procedures were used in 25 states.

FHWA provided $3.5 billion in funding for approximately 3,000 bridge projects through the Highway Bridge Replacement and Rehabilitation Program.

Optimized traffic flow strategies and enhanced transit operations are regularly being introduced through ITS technologies and operating practices such as signal retiming, incident management techniques, and work zone improvements during construction.

Next Question: The American Society of Civil Engineers (ASCE) is addressing infrastructure vulnerability and developing strategies for mitigating the effects of natural and man-made disasters on critical elements of the nation's infrastructure. As a result, ASCE's Board of Direction has developed guidelines for the Critical Infrastructure Response Initiative (CIRI), which was approved last fall. What are its goals?

Look for the answer in our next issue of McMahon in Motion.

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