

THE

CONSTRUCTION STORY

WHAT'S GOING ON IN METRO CONSTRUCTION

Volume 1, Issue 3

April 1996

Imagine

*"You may say I'm a dreamer,
but I'm not the only one.
I hope some day you'll join us,
and the world will live as one."*

-John Lennon

Teamwork is an often overused word. But it's an essential concept if the MTA is to complete its mandate to the citizens of Los Angeles County. To paraphrase a John Lennon song: Imagine a workforce where individuals pull together for a bigger purpose, where each person's role ties into the whole to make things work.

No need to imagine, because it's already happening. While this newsletter is mainly directed to Construction Division employees, helping each other do our jobs better occurs throughout the MTA more and more every day. Every agency newsletter, board report, and public presentation reflects examples of teamwork.

Can you imagine doing your job without the support of at least some of these types: accounting wizards, strategists, graphic artists, computer experts, attorneys, marketers and media relations folk, human resource specialists, engineers and designers, capital and regional planners, bus and train operators, customer relations people, government and public affairs officers, real estate and risk management professionals, writers, printers, mechanics, mailroom workers, facility and maintenance crews, bus schedulers, transit police officers and an in-house librarian? The fact is, the MTA as an entity could not do its work without all of these functions. Whether we're secretaries, clerks, laborers, professional staff, managers or executives, our day-to-day jobs require working with each other.

There was a time not long ago when we were employees of two distinctively different organizations, considering ourselves separate one from the other. When we merged to become the MTA, some people left, but most stayed. New workers and leaders have since joined our ranks. Things are not like they used to be.

This month is the third anniversary of the merger, and it seems fitting to reflect upon how far we've come. Today we're closer to being a cohesive "one."

At times it has been confusing, and some of the kinks have yet to be worked out. But, for the most part, a new routine has kicked in and we're getting the hang of it. Inter-departmental relationships have developed, new office friendships are being forged, and trust is growing between the workers of our once-separate agencies. Without an overall teamwork attitude, the process would be slower, if not impossible.

Eastward Bound

Page 2

Despite unsettling times during the last three years, our buses and trains have continued to roll, our rail systems are being built, our transit police are on duty throughout the system, our construction safety record continues to shine, and we're meeting our project timelines. Piece by piece, rail by rail, bus by bus, the MTA is doing its job - 24 hours a day, 365 days a year.

Whether we came from the RTD or the LACTC, most of us have been doing what we do for a long time - and we've been doing it well. Three years ago, it was hard to imagine doing it together as the newly-formed MTA. Now, it's almost hard to imagine it any other way. ✕

Eastward Bound

New Technology Could Speed Up the Trip

The latest in construction technology has produced yet another faster and better tunnel boring machine. The subject of great discussion at a special April 4 MTA Construction Committee meeting, the machine is being considered for use on the Eastside project.

The meeting was held to further consider recommendations made by Flour Daniel, Inc. in an investigative report issued in November. The report details several innovative management approaches, including the proposed joint project office, and other potentially beneficial alternatives for the Eastside project. The highlight of the meeting was geotechnical expert Dr. Dan Eisenstein's comparison between a newer type of tunneling machine and the version the MTA has been using.

Although the initial cost for the state-of-the-art equipment may be double the price of the present technology, Dr. Eisenstein told committee members that the process can greatly reduce the risk of ground sinkage, and will, in the end, save overall project costs because it can do the job faster and cut back the need for grouting.

Dr. Eisenstein used diagrams to show the differences between the standard, open-faced machine currently used on Red Line projects and the newer, closed-faced version. He recommends a closed-faced variation for the Eastside because it can secure the face of the tunnel and virtually eliminate settlement. By applying a positive pressure directly to the tunnel face, a "blanket-type" protection against problems is provided without the necessity of altering the ground conditions (by grouting, dewatering, freezing, etc.).

"This is a technology that the world tunneling industry has been moving toward in the past few years," said Dr. Eisenstein. "It has proven very effective in controlling ground settlement."

"Lessons-Learned" in North Hollywood

The recent signs of ground settlement in North Hollywood at Lankershim Boulevard were brought up by various committee members.

Dr. Eisenstein reminded them that the open-faced tunneling machine used in North Hollywood was selected several years ago, based upon the best information and tunneling experience available in the U.S. at the time.

"The tunneling method used at Lankershim Boulevard was the outcome of the prevailing state of technology at the time the tunneling contract was commenced," said Dr. Eisenstein. "The same approach had been adopted at seven MTA tunneling contracts prior to this one and resulted, with one exception, in many miles of flawless tunneling.

"The claimed damages at Lankershim Boulevard have not been shown, at least so far, to be a direct result of the tunneling activities. Some of them, by their physical nature, are impossible to be linked with the tunnels' excavation," added Dr. Eisenstein.

This month the Construction Committee and the MTA Board will continue to debate, and ultimately decide, the management approaches and tunneling technology best suited for the Eastside project. ✕

The Verdict Is In

Grand Jury Backs QA Program

It's worth taking note when the L.A. County Grand Jury gives out high marks. That's exactly what happened this month when the Grand Jury released the results of its study of the MTA's rail construction Quality Assurance (QA) program. The jury's report concludes that the "MTA has developed a strong quality assurance program" and "is on the right track."

The county's Grand Jury is set up to "provide civil oversight to county operations with a view toward improving efficiency and value of those operations..." The report defines quality assurance as "those policies, procedures, personnel and activities needed to monitor fully and control the implementation of the design and engineering of the rail system into a fin-

"I am not judged by the number of times I fail, but by the number of times I succeed, and the number of times I succeed is in direct proportion to the number of times I can fail and keep trying."

Printed on business card of MTA Board Member and Construction Committee Chairman, Raul R. Perez

ished project meeting all design, governmental and safety requirements.”

Motivated by “bad” press

The investigation was spurred by questions raised in the press last year about the caliber of MTA’s construction program following reports of thin tunnel walls. The jury reviewed the MTA’s formal policies and procedures, its lines of authority, the relation of quality control issues between projects and other government agencies, and confirming documentation, inspection reports and corrective action reports. The jury also met face to face with MTA staff, traveled to view firsthand underground construction, took a ride on the completed Red Line, and asked questions all along the way. Finally, before they were finished, they repeated the entire process all over again.

Cooperative staff

The jury panel praised MTA staff members for their willingness to provide the “whole story,” saying that “their approach built confidence in their quality and engineering personnel.” Three staff members contributed their time to provide the requested information and documentation: MTA Quality Assurance Manager Garry Warren took the lead early on when the jury first contacted the MTA last August; Metro Red Line Project Manager Charles Stark joined in the first interview session in early September, and later the same month, Bill Moore, hired as the new director of Quality Assurance, completed the team.

Positive findings

The jury found little reason for concern. For example, when referring to the use of a quality assurance control document called a “Nonconformance Report (NCR),” they tracked one such report on the Vermont Tunnel from beginning to end. They found the entire process, which started with a Daily Inspection Report and ended with a completed solution, was handled in a prudent and timely manner. The jury reported that control was maintained and the NCR was not closed until the necessary repair work was completed and passed inspection.

Thoroughly researching the QA program, the jury found that from 1990 to 1994, QA was handled by the construction manager with the

MTA having oversight control. The MTA began establishing an in-house capability in 1994, and when Stan Phernambucq came on board in mid-1995, he fully endorsed the program and elevated QA’s reporting relationship directly to his office. Today, the QA staff numbers 17 people, further strengthening the long-term quality effort.

Program manual rated high

One of the many things that impressed the grand jury was the Quality Program Manual that the MTA produced in 1991. Much of that manual was adopted by the Federal Transportation Administration as a standard for the industry. Six of the nine sections of the FTA’s Quality Guidelines—on recommended policies, procedures and formats—were copied word for word from the MTA’s Quality Program Manual.

Construction safety also recognized

Finally, the panel applauded the MTA’s Construction Safety Program, saying that “on every occasion we found safety issues considered and in the field adequate safety procedures in place.”

Garry Warren said he was gratified that “we’ve had this opportunity to have our quality program scrutinized—and to be validated—by an organization with the credibility of the Los Angeles County Grand Jury. ✕

Runyon Canyon Easement Granted

On April 3, the Board of Recreation and Parks Commissioners officially approved an underground easement for tunneling under Runyon Canyon Park in the Santa Monica Mountains. The 3-to-1 vote helped the MTA cross another hurdle in its tunneling plans to extend the subway through the mountains to North Hollywood.

The project has been plagued by controversy since a majority of the residents and property owners in the Hollywood Hills have fought against it. The park’s neighbors urged the

“All the procedures were standard and effective despite negative reporting surrounding the event,” said the Grand Jury report.

board to recommend that the MTA suspend construction and do another environmental impact report to determine whether the project will harm wildlife and vegetation in the area. However, Parks Commission President Steven Soboroff said that the board thoroughly addressed such concerns.

Under its agreement with the parks commission, the MTA will not construct 900-foot-deep ventilation shafts that would surface just outside the park and will work with the Santa Monica Mountains Conservancy to consider ways to minimize environmental harm to the park. The MTA will also put \$4 million into a trust fund to cover any unforeseen and unexpected damage. ✕

Metro Speak

Assistant Board Secretary Janne Nielson Goes Underground

This month, the Metro Speak column features the voice of a non-Construction Division employee who offers her impressions of our work.

Janne Nielson came to the MTA as Assistant Board Secretary only seven months ago, but she's already trekked far below the city's streets to see first-hand the building of a subway tunnel.

It's not unusual for Janne to venture outside the "box." In addition to six-years' experience working for city councils and public boards, Janne has several years' experience as the helpful, professional voice at the other end of a 911 line. As both a police and fire dispatcher, she would ask to go on "ride alongs" to learn more about what the officers and firefighters had to deal with every day. She's even been a volunteer firefighter herself, as well as doing other public safety work.

It's no wonder then that Janne asked Stan Phernambuq for a field trip to a subway construction site; it's just part of her personal plan to orient herself at the MTA and better understand board issues and staff responsibilities.

Stan referred Janne to Steve Polechronis, project manager for the Hollywood/Vermont Corridor

of the Red Line, Segment 2, who, along with Wilshire Corridor Area Manager John Sohn, took her out in the field one day last month to the nearly-completed tunnel between the Wilshire/Western and Wilshire/Vermont stations. Outfitted with a new hard hat and sporting the obligatory hard-soled shoes, Janne followed Steve and John underground.

"The tour helped me grasp the importance of what we're building. John pointed out the subway's features, and explained even the smallest detail. Suddenly, I saw the enormity of it all," said Janne. "What impressed me the most was the huge scale of this undertaking. It's awesome to realize the expertise and technology that's going on below the streets and sidewalks. No one passing by above could have any idea how big it really is.

"I was amazed by such details as the fire exiting system on the station platforms and the escalators and elevators" she said. "I imagined lots of people riding up the escalators and using the trains. I'm really proud to be a part of it all."

The best part of Janne's tunnel tour was seeing another department in action and meeting other employees. "I respect the current efforts toward direction and leadership throughout the whole MTA. In my experience, most people are willing to work together as a team if they're given a vision and a road map to follow." ✕

[NOTE: A new program has been developed for employees who wish to tour MTA facilities and work sites. Tour dates are currently scheduled for visits to the Regional Rebuild Center, bus operations at Division 10, the Central Control Facility, and for a ride on the Red Line and Blue Line. Contact Cathy Dickinson in the marketing department at ext. 25611.]

"To be successful, the first thing to do is fall in love with your work."

Sister Mary Laretta, Roman Catholic Nun

Hats Off

A Hero Among Us

It's not often we find real-life heroes in our midst, but Metro construction iron worker John Walchak has earned the distinction. Recently, when construction workers at the B271 Contract, Hollywood/Western Station noticed a man trying to coax a 10-year-old girl into his car against her will, John interceded and eventually "persuaded" the man to leave the area. The incident took place early in the morning at a bus stop near the job site. John also took down the license plate and called LAPD who ran a check on the car. Because the registered vehicle owner had outstanding warrants for offenses similar to the current scenario, police officers staked out the scene the following morning. When the "suspect" showed up again, he was arrested.

A Kiewit employee, John has been recognized with a special commendation from the MTA's Transit Police Department, as well as from Stan Phernambucq.

CEO Commends the Construction Division

In an interview in the March issue of *Metro Investment Report*, MTA CEO Joseph Drew was asked about the negative press received about our construction program. Joe pointed out the division's many accomplishments over the past six months, including our successful efforts to obtain the Runyon Canyon easements, the firing of the contractor on the Hollywood/Vermont project following the sinkhole incident, the overall improvements in the contracting process and the new controls between staff and the private sector.

Bill Moore is Symposium Panelist

Director of Quality Management Bill Moore was a panelist last month at the 2nd Annual Symposium on TQM at USC's Department of Civil Engineering.

Bill discussed implementation of an MTA Total Quality Program that addresses problems and arrives at solutions and how program improvements have been made along the way,

Dr. Geoffrey Martin, Professor and Chairman,

USC Civil Engineering and a member of the MTA's Eisenstein Panel, was also a speaker. Other panelists included executives from Jacobs Engineering, Fluor Daniel, Peck Jones and Dinwiddie Construction.

Leann Taagepera Publishes Article

Leann Taagepera, an environmental specialist in Environmental Compliance, co-authored an article in the Winter issue of *Environmental Monitor*. The article, "London Underground Environmental Planner Studies CEQA" was jointly written by Leann Jonathan Ben-Ami, a Senior Environmental Planner at London Underground Limited, a subsidiary of London Transport .

Leann met Jonathan while he was here working on his thesis about mitigation monitoring requirements in California. Jonathan visited the MTA, as well as other California agencies (BART, Sacramento Regional Transit, etc.) to learn from our experience dealing with large, complex projects through studying California Environmental Quality Act (CEQA). This research will help London Transit set up a common framework for monitoring mitigation of its projects.

Colorful Construction Fence at Sunset/Vermont

The construction fence at Sunset/Vermont is more than a fence – it's a work of art. The 100-plus art panels were painted by volunteer artists, including some smaller ones by young oncology patients from Childrens Hospital of Los Angeles and Kaiser Permanente who painted self-portraits. The larger panels, mostly depicting people riding on trains and buses, measure eight feet by four feet.

The project took two months to complete, and was facilitated by MTA Public Affairs staff, with the help of Tutor-Saliba-Perrini Project Manager Pete Clark and Parsons-Dillingham Resident Engineer Dane Hudson. An unveiling ceremony at Barnsdall Art Park last month was attended by about 100 student and community participants, including Los Angeles City Councilmember Jackie Goldberg. ✕

"True heroism is remarkably sober - very undramatic. It is not the urge to surpass all others at whatever cost, but rather the urge to serve others at whatever price."

Arthur Ashe

Organizational Changes

At his April 16 senior staff meeting, Executive Officer Stan Phernambucq announced the following organizational changes: **John Adams** has been named to a newly-designated position as Deputy Executive Officer, Project Management & Technical Services; **Joel Sandberg** has been named Deputy Executive Officer, Engineering; and **Alfonso Rodriguez**, who was hired this month, will be the new Deputy Executive Officer and Project Manager, Eastside Red Line Project. A Professional Engineer, Al comes to the MTA with several years experience with local municipal engineering firms; a profile will be provided in next month's newsletter. Recruitment will soon take place for the newly-created position of Deputy Executive Officer, Construction Administration.

In addition to the above changes, Stan announced that **Al Theide**, who has been the Deputy Executive Officer, Engineering for 5-1/2 years, is retiring next month, and Deputy Executive Officer **Rodney Dawson**, who has been with MTA's Construction Division for 4-1/2 years, is transferring to Finance where he will work for **Ronny Goldsmith**, the MTA's CFO.

New Construction Division*New Employees in April*

Alberta Alva, Sr. Cost/Schedule Analyst; **Paul Briggs**, Sr. Cost Estimator; **Sarah Brown** and **Leticia Leones**, Project Management Secretaries; **Michael Cummings**, Project Management Data Technician; **Ann John**, Project Engineer; **Jai Tharus**, Project Engineer; **Maria Luk Castro** and **Glendora Walker**, Program Management Secretaries; and **Tresala Wilkerson**, Contract Management Secretary.

Assembly Backs MTA Safety Bonuses

Prompted by two articles in the Los Angeles Times last September, the state's House Committee on Transportation and Infrastructure investigated the MTA's safety bonus payments to its contractors. The House Committee's report, which was issued on March 19, refuted most of the information in the newspaper articles. It stated that (1) MTA's safety record is "outstanding," that no fatalities over a 10-year

period is unique for comparable projects worldwide; (2) MTA's Lost Time record is on a par with other benchmark authorities; (3) MTA's bonus program is similar "in all material aspects" to the safety incentive programs of other major transit authorities nationwide.

Construction Safety Education Classes

The month of May is packed with construction safety training classes, such as the OSHA 30-hour training (part 1 of 5), American Red Cross CPR, Tunnel Hazard Awareness training, CHST Test Review, New Tunnel Safety Orders Review, New TSO Gas Tester Training, and Fall Protection Training (the new law). Contact Randy R. McBurnett at ext. 27204 for dates and enrollment information.

Professional Development Classes

Two business skills classes are being offered to employees:

Dealing with Difficult People

April 30, May 9 & May 22

The Successful Negotiator

May 14 & June 5

Class descriptions may be picked up in the Employee Development Department of Human Resources on the 4th Floor, or contact Lavenia Sims at ext. 27113 for enrollment information. ☒

"If you want things to change, you have to change."

Charles Stark, Red Line Project Manager

The Construction Story

A monthly employee publication of the MTA's Construction Division

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Masthead photo: Construction "flaggers" at North Hollywood (Segment 3) construction site; **page 3 photo** of a construction miner Hollywood/Vermont site; both photos taken by award-winning Metro construction photographer Ken Karagozian.