

Facing a deadline for completing a street widening project, the contractor "worked around the poles" after repeated attempts failed to get the facility owner to move them.

n the East Coast it's "a nightmare." In Colorado "the problem is absolutely universal." In Minnesota, it gets within a day of being "contempt of court." What is causing the fuss? Getting utility lines moved out of the way of new construction, especially in public rights of way.

To some contractor's associations, utility relocation is the biggest problem their members face. To state Departments of Transportation, utility relocation is a headache with two sides: utilities are not always where they are shown on as-builts; and they are not always relocated to the place they are assigned. To the utility, a major part of the problem is not being given sufficient notice to prepare for moving lines.

Some time in the past, a utility was allowed to place its lines or poles in public right of way. Today, the governmental unit wants to upgrade its road and the utilities are in the way and need to be relocated. The problem comes to a head when the contractor encounters lines that were not on the drawings he used to generate his bid, or has to work where the lines are and the utility hasn't moved them.

Art Daniel of BORTUNCO, a contractor in Texas, tells of a Texas DOT project where he had the job of installing 3,000 feet of storm sewer. The existing street was going to be made into an underpass. It first had to be widened to keep traffic moving while the middle was dug out. At 800 feet into the project, work had to stop because communication lines had not been moved. The result was a 5-month delay. Daniel says the TxDOT is good to work with. They don't

penalize for these delays, and they someti mes compensate for such downtime, even though they can't often regain the lost money, and the utility loses nothing for causing the delay.

It takes Daniel from one to ten days to demobilize crews and remobilize them at another site, "But" he says, "You have to find another place and for who knows how long!"

Minnesota Utility Contractors Association (MUCA) President, Ted McCrossan of C. S. McCrossan, says government agencies are reluctant to put deadlines for moving utilities into contracts. Some individuals in government will light a fire under utilities to move their lines. But when faced with construction delay from unmoved lines, most agencies will say "Mr. Contractor, you have a problem, and remember you have a deadline or you face penalties."

Court Steps In

Also in Minnesota, the question of who was going to pay for moving buried utilities in the path of a light rail project was unsettled and time was running out for keeping the project on schedule - including a significant loss of federal funding. A court decision gave utilities a deadline for producing the plans for the move and let the decision about who pays to be settled later. The plans arrived from the facility owners a day before the deadline.

The other face of the problem is finding unexpected utilities in the work path. Charlie Ware, Executive Director of the Wyoming Contractors Association tells of a street renovation project in Cheyenne. It

was a 3-phase project. The third phase was supposed to start at the downhill end of the street and work uphill. That way, new sewers would drain properly. However, a major water main was found to be in the way that no one knew about until the project started. To gain time to figure out how to move the main, work was started on the uphill end, which meant that the slope was going the wrong way and the sewer lines brought their product to the work area instead of away from it! Interestingly, on the second phase, Subsurface Utility Engineering was used, but for some reason, it was not used on the third part and the water main problem threw the schedule off by three months.

Murray Allen of the Texas DOT agrees on the lack of utility responsiveness and lack of knowing where their underground plant is, and adds a third factor: "Many utility people don't understand engineering plans," he says." They don't plan out their work by drawing plans and setting up a survey line that has stakes. If they encounter an obstacle in the way, they just go around it, not thinking that now that they have moved over, sometimes only six inches, that now they have caused the water line that was going to go there to have to move over.

"They don't understand the concept that they are in the public right of way and they have to move at their expense. They think, we are here, why should we have to move? They think the DOT is a hindrance to them. That is the risk you take when you put your line in the right of way. They resent it and they fight it. They make it adversarial."

Tx DOT Promotes SUE

Allen's DOT District is promoting the use of Subsurface Utility Engineering (SUE). Because companies have merged or cut back staff, they may not have accurate records of existing plant or the draftspeople to do designs for relocations. Using the SUE process determines, at the project owners expense, where all the utilities are, then the DOT can work with the utility to design the relocation on the master plan where all the parties are using the same coordinates so everything fits.

On the east coast, Walter Gainer of W. F. Wilson & Sons, and former President of the National Utility Contractors Association, sees several solutions to the nightmare of getting utilities moved. One solution, he says, is to put the movement of the utilities under the guy who got the contract. "The state has a liaison," he says, "but they are not on an excitement plan like I am." Gainer likes to be able to move the lines that are the first to be in conflict with the work and to do it with a "sense of urgency."

According to Allen, TxDOT is putting more and more of the utility relocation work into the TxDOT contracts. Instead of the utility doing the moving, the utility does the design and it is put in TxDOT's plans. It goes out for bid, and the highway contractor moves the utility or subs out the move. It's easier on the utility, as one less project to worry about, and TxDOT knows it will get in the right place.

One problem TxDOT has had is that utilities like gas and telephone use preapproved contractors. The state requirement is that it is open bid. TxDOT has found ways to allow contract language calling for "qualified bidder approved by the utility." Bids for city water and sewer are done like state bids so they are easy to put into the contract.

the utilities cost because items like mobilization and traffic control are built into the cost of the contractor. When TxDOT is paying for the relocation, the utilities gets another benefit - they don't have to advance the cost of relocation and wait for reimbursement. When the utility is responsible for the cost of the move, *they* pay the money into an escrow account for

DOT's use.

Bid prices sometimes come out lower than

The Embarrassment Factor

Gainer's second solution is for everyone who has a stake in the project to sign a partnering contract. He says: "When you sign a partnering contract at the beginning, most people work at it. When a meeting is coming up, you make sure you have all your answers and try to move things forward." How do you get action? "Keep hounding them at team meetings. Partnering embarrasses slow movers in front of the rest of the partners." He feels people really try to have their answers prepared and do try to move forward.

Jay Lower, Executive Director of the Colorado Contractors Association says getting utilities moved has been a problem ever since he has been around. He is seeing contractors sue utilities when deadlines for moving lines is in the contract and those deadlines are missed. He says: "Utilities use the public ROW at no charge. There should be a mandate to move lines when the public need requires it."

QWEST's Rich Nelson sees a major part of the problem as not being given sufficient notice to prepare for moving lines. He points out that, depending on the complexity, it takes from 3 months to a year to get everything in place for a utility move. The process includes budgeting, getting materials and crews lined up, and especially, getting permits for a place to move the lines to.

US WEST, now QWEST, put out a brochure last year to assist relocations in Minnesota. It is titled "Relocations of US West Facilities - Please help us to help you!" It lists QWEST contact people for each area of the state, deadlines for various stages of a project, and information needed about the project.

Telco Spells Out Lead time Needs

The brochure also gives minimum time necessary to relocate facilities. Any underground duct systems - 12 months, buried fiber cable - 9 months; buried copper cable or poleline - 6 months; polelines with ROW - 12 months.

"The mentality still exists that that is just a phone line, I don't know why you can't move it." Nelson says. Moving telephone lines, especially old ones, is more complex than one might suspect. Nelson points out that a parallel line has to be built and service cut over. But it is not a quick cutover. It is maintenance and has to be scheduled in a very restricted and controlled time-frame so service can be maintained. Businesses may use their lines from 6 am to 10 pm for voice, and often use night hours for data transfer. Because they use the same physical phone lines, the cutover can be very challenging.

The Minnesota Utility Contractors Association (MUCA) looked at a legislative approach to the problem several years ago, but ended up forming a study group with the state DOT and several utilities. Terry Zoller, a Division Construction Engineer with MnDOT, says that since the group formed, they have had better cooperation among contractors and utilities, but need another year to assess results. Zoller says the DOT is now trying to get the first information about a project and project timelines to utilities earlier, and to get line locations on plans so bidders know what underground lines they will have to deal with. In the Twin Cities Metro area, the utilities are locating and marking their lines early in the design stage and the DOT is using GPS to put the location of the marks on the drawings.

McCrossan says some good has been done, but much remains to be done. He says contractors are demanding that DOT staff take better notes at meetings and document agreements with utilities. Although Minnesota has a statute requiring project owners to show existing utilities on drawings, consulting engineers tell McCrossan many utilities are not forthcoming with information in a timely manner.

"Until agencies are willing to work with contractors," says McCrossan, "We need a hammer to compel action."

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