

# An Operator Perspective: On the Benefits of DIRT

# How Many Of Us And Our Organization Do A Better Job:



- If we have measureable results?
- If we know what contributes to make up the results?
- If we have goals?

- **We needed useful  
3<sup>rd</sup> Party Damage  
Root Cause  
Information**



# What did we know at the end of 2007?



- 8267 Damages for the enterprise
- 1.5 Million locates for the enterprise
- Damage per 1000 locates – 5.49
  
- All good information BUT?
- How do we get better?

# We had measureable results!



- **2007-5.49 Damages per 1000 Locates**
- Now what?

# What was our 1<sup>st</sup> Step?



- Modified our forms and made information required.

Third Party Name \_\_\_\_\_  
 Person or Company Name \_\_\_\_\_ Contact Person \_\_\_\_\_ Contact Phone # \_\_\_\_\_

Third Party Address \_\_\_\_\_  
 Address \_\_\_\_\_ City \_\_\_\_\_ State \_\_\_\_\_ Zip \_\_\_\_\_

Insurance Co. \_\_\_\_\_ Ins. Agent \_\_\_\_\_ Ins./Phone Number \_\_\_\_\_

Reason Damage Occurred	Facility Affected	Type of Contractor	Type of Work
No Locate Requested <input type="checkbox"/>	Distribution Main <input type="checkbox"/>	Developer <input type="checkbox"/>	Agriculture <input type="checkbox"/>
Failure to hand expose <input type="checkbox"/>	Transmission Main <input type="checkbox"/>	Farmer <input type="checkbox"/>	Building Construction <input type="checkbox"/>
Locate ticket expired <input type="checkbox"/>	Service <input type="checkbox"/>	Municipality <input type="checkbox"/>	Building Demo <input type="checkbox"/>
Locate Requested-incorrect mark <input type="checkbox"/>	Other <input type="checkbox"/>	Other Utility <input type="checkbox"/>	Cable TV <input type="checkbox"/>
Locate Requested-not conducted <input type="checkbox"/>		Property Owner <input type="checkbox"/>	Curb/Sidewalk <input type="checkbox"/>
Vehicular <input type="checkbox"/>			Drainage <input type="checkbox"/>
Insufficient Locate Time <input type="checkbox"/>			Driveway <input type="checkbox"/>
			Electric <input type="checkbox"/>
			Engineering/Surveying <input type="checkbox"/>
			Fencing <input type="checkbox"/>
			Fiber Optic <input type="checkbox"/>
			Gas <input type="checkbox"/>
			Irrigation <input type="checkbox"/>
			Landscaping <input type="checkbox"/>
			Petroleum Pipeline <input type="checkbox"/>
			Poles <input type="checkbox"/>
			Pole Placement <input type="checkbox"/>
			Road Work <input type="checkbox"/>
			R/R Maintenance <input type="checkbox"/>
			Sanwer <input type="checkbox"/>
			Steam <input type="checkbox"/>
			Storm Drain/Culvert <input type="checkbox"/>
			Street Light <input type="checkbox"/>
			Traffic Sign <input type="checkbox"/>
			Traffic Signal <input type="checkbox"/>
			Transmission Pipeline <input type="checkbox"/>
			Waterway Improvements <input type="checkbox"/>
			Water <input type="checkbox"/>
			Unknown/Other <input type="checkbox"/>

Equipment Causing Damage	Location Damage Occurred	Number of Customers Affected	Injuries or Death	Damage to Property
Auger <input type="checkbox"/>	CITYST Public - City Street <input type="checkbox"/>	Zero <input type="checkbox"/>	Yes <input type="checkbox"/>	Yes <input type="checkbox"/>
Boiling <input type="checkbox"/>	STHWY Public - State Highway <input type="checkbox"/>	One <input type="checkbox"/>	No <input type="checkbox"/>	No <input type="checkbox"/>
Directional Drill <input type="checkbox"/>	PLBOH Public - County Road <input type="checkbox"/>	2 to 10 <input type="checkbox"/>		
Drilling <input type="checkbox"/>	PLBOH Public - Other <input type="checkbox"/>	10 to 50 <input type="checkbox"/>		
Explosives <input type="checkbox"/>	LANDOWN Private - Land Owner <input type="checkbox"/>	50 or more <input type="checkbox"/>		
Farm Equipment <input type="checkbox"/>	BIZ Private - Business <input type="checkbox"/>	Unknown <input type="checkbox"/>		
Grader/Scraper <input type="checkbox"/>	PRVRES Private Easement <input type="checkbox"/>			
Hand Tools <input type="checkbox"/>	PIPE Pipeline <input type="checkbox"/>			
Probing Device <input type="checkbox"/>	PWRTRNS Pwer/Transmission Line <input type="checkbox"/>			
Tractor <input type="checkbox"/>	RAIL Railroad <input type="checkbox"/>			
Backhoe/Trackhoe <input type="checkbox"/>	DPUE Dedicated Public Utility Easement <input type="checkbox"/>			
Vacuum Equipment <input type="checkbox"/>	FDCLND Federal Land <input type="checkbox"/>			
Unknown/Other <input type="checkbox"/>	NOTOOL Data Not Collected <input type="checkbox"/>			
	UNKNOWN Unknown/Other <input type="checkbox"/>			

Accounting  
 Project #: \_\_\_\_\_  
 FERC #: \_\_\_\_\_

Located By: Company  Contractor

Locate Priority: Routine  Short Notice  Emergency

Locate Ticket Number: \_\_\_\_\_  
 No Locate Requested

Date Locate Requested: \_\_\_\_/\_\_\_\_/\_\_\_\_

Damage Area: Line Pressure \_\_\_\_\_  
 Leak Area Sq. Ft. \_\_\_\_\_  
 Leak Duration Minutes \_\_\_\_\_

DiIed: Yes  No

Date Located: \_\_\_\_/\_\_\_\_/\_\_\_\_ Time Located: \_\_\_\_:\_\_\_\_

Comments: \_\_\_\_\_

# By gathering this information and entering into DIRT; what did we learn?



- 48% of damages were caused by –
    - “No Locate Requested”
  - 25% of damages were caused by –
    - “Failure to Hand Expose in Tolerance Zone”
  - 18% of damages were caused by –
    - “Inaccurate Mark”
- 91% of damages are attributed to these three “Root Causes”

# By gathering this information and entering into DIRT; what did we learn?



- Contractors cause over 50% of damages to our system
- Followed by:
- Municipalities
- Other utilities
- Home Owners



# Where does that leave us?

- 2007 – 5.49 damages per 1000 locates
- Measureable results
- Root cause (what is contributing to make up results)
- We need a GOAL!
- Goal for 2008 – 4.0 damages per 1000 locates
- Now what?

# Actions taken to reach our GOAL:



- Enterprise Damage Prevention Team
- Ticket management system
- Positive response to all excavators
- Identified areas with high damage numbers and targeted specific groups for education/training
- We developed our own presentation/handouts that supervisors and others could use to educate
- Met with mayors and other public officials to educate them to the dangers
- Investigate all damages caused by “inaccurate mark” and try to determine reason

# Actions taken to reach our GOAL:



- Became active as a company in trying to enhance “dig laws”
- Starting in the few months - all our outgoing correspondence to customers will have the 811 message on it
- Door hangers with 811 message and information concerning excavation safety
- New technology
- **CHANGING OUR CULTURE!**

# What did DIRT do for us?

