

Documentation for  
Completion of Grease and Odor Control Project  
On Collection Line Using:

**Micro-Solve<sup>®</sup>**

**CLIENT** - Severn Trent/MUD 163

**LOCATION** - 8507 Hot Springs Collection line H1-H2-H3-H4-H5-H6-H7-and  
Lift Station # 1 8411 Sunny Ridge Dr. Houston Tx. 77095





Shannon Birdwells - President of the Board MUD 163  
Board members of MUD 163  
Bill Richmond & Cyrus Damas – Severn Trent Services  
32259 Morton Road  
Brookshire Tx. 77423

December 3, 2015

Re: Results of 3 month Micro-Solve® testing.

Mr. Birdwells,

Thank you and the board for the opportunity to do this important testing.

**Project Duration:** 3 months

**Application date and dosage and total gallon used:**

Thursday August 6<sup>th</sup>: 5 gallons of Micro-Solve® into South Side manhole on 8507 Hot Springs

Thursday August 13<sup>th</sup>: 5 gallons of Micro-Solve® into South Side manhole on 8507 Hot Springs

Thursday August 20<sup>th</sup>: 5 gallons of Micro-Solve® into South Side manhole on 8507 Hot Springs

Thursday August 27<sup>th</sup>: 5 gallons of Micro-Solve® into South Side manhole on 8507 Hot Springs

Thursday September 3<sup>rd</sup>: 5 gallons of Micro-Solve® into South Side manhole on 8507 Hot Springs

Thursday September 17<sup>th</sup>: 5 gallons of Micro-Solve® into South Side manhole on 8507 Hot Springs

Thursday October 1<sup>st</sup>: 5 gallons of Micro-Solve® into South Side man hole on 8507 Hot Springs

Thursday October 15<sup>th</sup>: 5 gallons of Micro-Solve® into South Side manhole on 8507 Hot Springs

**\*\*Last Application\*\***

Total Gallons used: 40 gallons.

## Expected Results:

- No chokes during application period.
- Expect to see grease that was stuck to the pipes, come loose and move its way downstream into the lift station.
- Lower H<sub>2</sub>S gases down stream.
- Better wastewater going to the treatment plant.
- Over time the amount of grease in the lift station will decrease and less vacuuming required.

## Results:

- There were zero chokes during the application.
- We are 4 weeks after the last application. Have there been any chokes?
- The collection line inspection graphs show great results that offer HUGE benefits.
- H1 to H2: Before and after shows that the camera made it through the line and the line showed no obstructions and no debris build-up.
- H2 to H3: (same) Before and after shows that the camera made it through the line and the line showed no obstructions and no debris build-up.
- H3 to H4: Before and after shows that the camera made it through the line and the line showed no obstructions and no debris build-up.
- H4 to H5 to H6 to H7 to the lift station: This graph work did not show build-up or obstructions before Micro-Solve® application and still shows no build-up or obstructions.
- The lift station continues to have no grease balls or chucks. The grease is not collected around the floats like it was before Micro-Solve® application. The grease is not collected around the lip of the lift station like it was before the Micro-Solve® application.
- The lift station was being vacced out every 6 months. Today it has been over 6 months since it was vaccuumed and because it is still clean, due to Micro-Solve®, it will not have to be vacced out for many more months to come.

## About Micro-Solve®

In Texas, Micro-Solve® has been solving grease, sludge, and odor issues for over 17 years. Remember that Micro-Solve® is NOT an enzyme, a bacteria or a quick fix “Drano” like emulsifier. Micro-Solve® aids in phase oil separation, separating the grease from other solids in the system, making hard grease loose and soluble, releasing bound oxygen and trapped micronutrients. Proteins, fats, carbohydrates, minerals, vitamins and oxygen become better able to be utilized by the micro-organisms that already live in the system. This increases the facultative microorganism populations and anaerobic and aerobic populations. All these benefits accelerate the bioremediation process at point of application and downstream and will not re-solidify downstream. This process sends the treatment plant more microorganisms with food that is in a better state to be bioremediated.

With regular applications, Micro-Solve® eliminates grease and sludge build-up in the collection and treatment system and will save you money. Micro-Solve® is 100% biodegradable!

Micro-Solve® works. Cleaning and eliminating grease and sludge in the collection lines and lift stations creates many cost effective benefits. We hope to start working together on other areas that may be of concern with grease, sludge and odor issues.

Thank you for testing Micro-Solve®. Please see below.

Sincere regards,

**Troy Scott Najar**

**Chief**

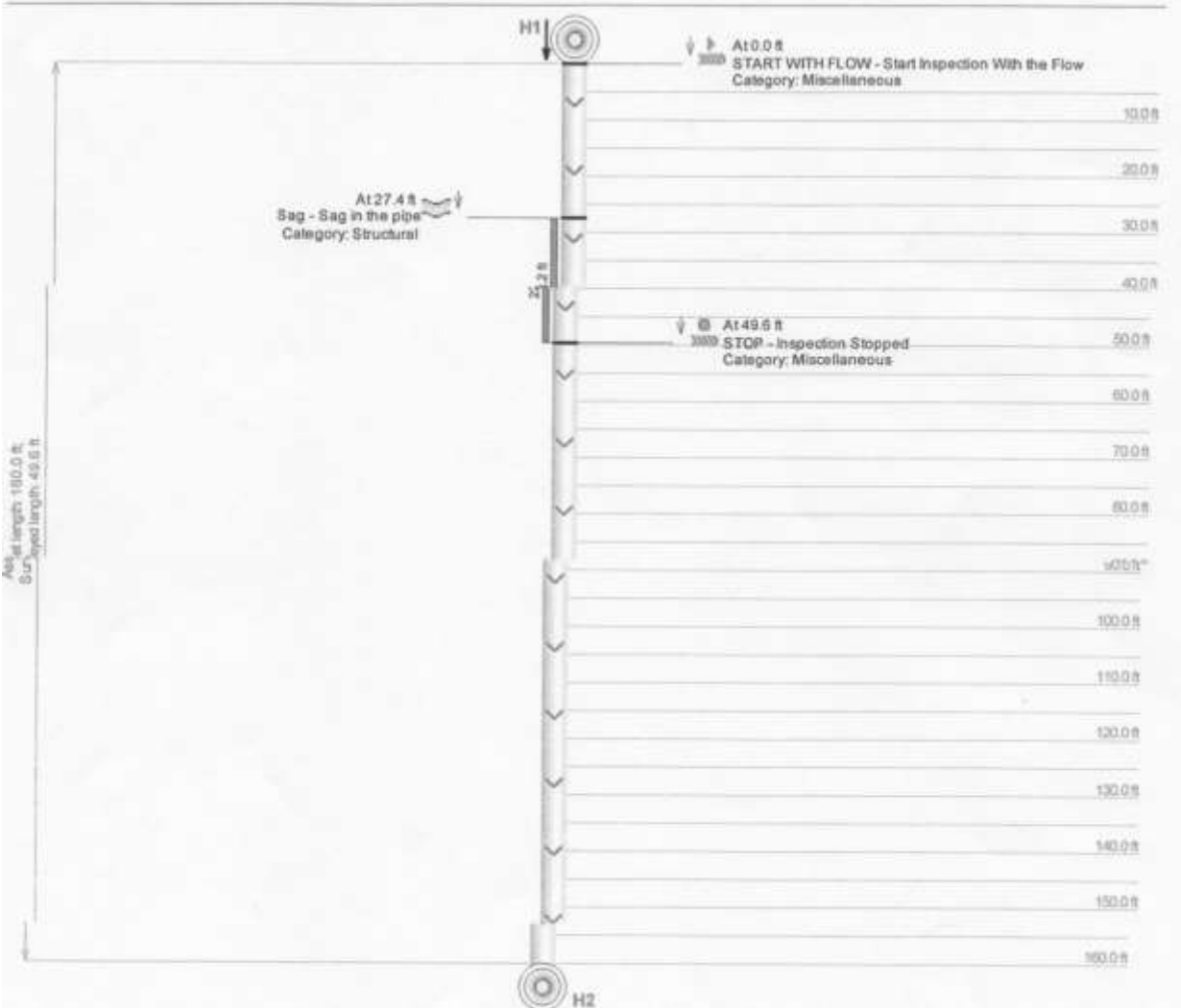
512.775.5358

[www.egsw.us](http://www.egsw.us)

Before Micro-Solve® H1 to H2

### Main Inspection with Pipe-Run Graph

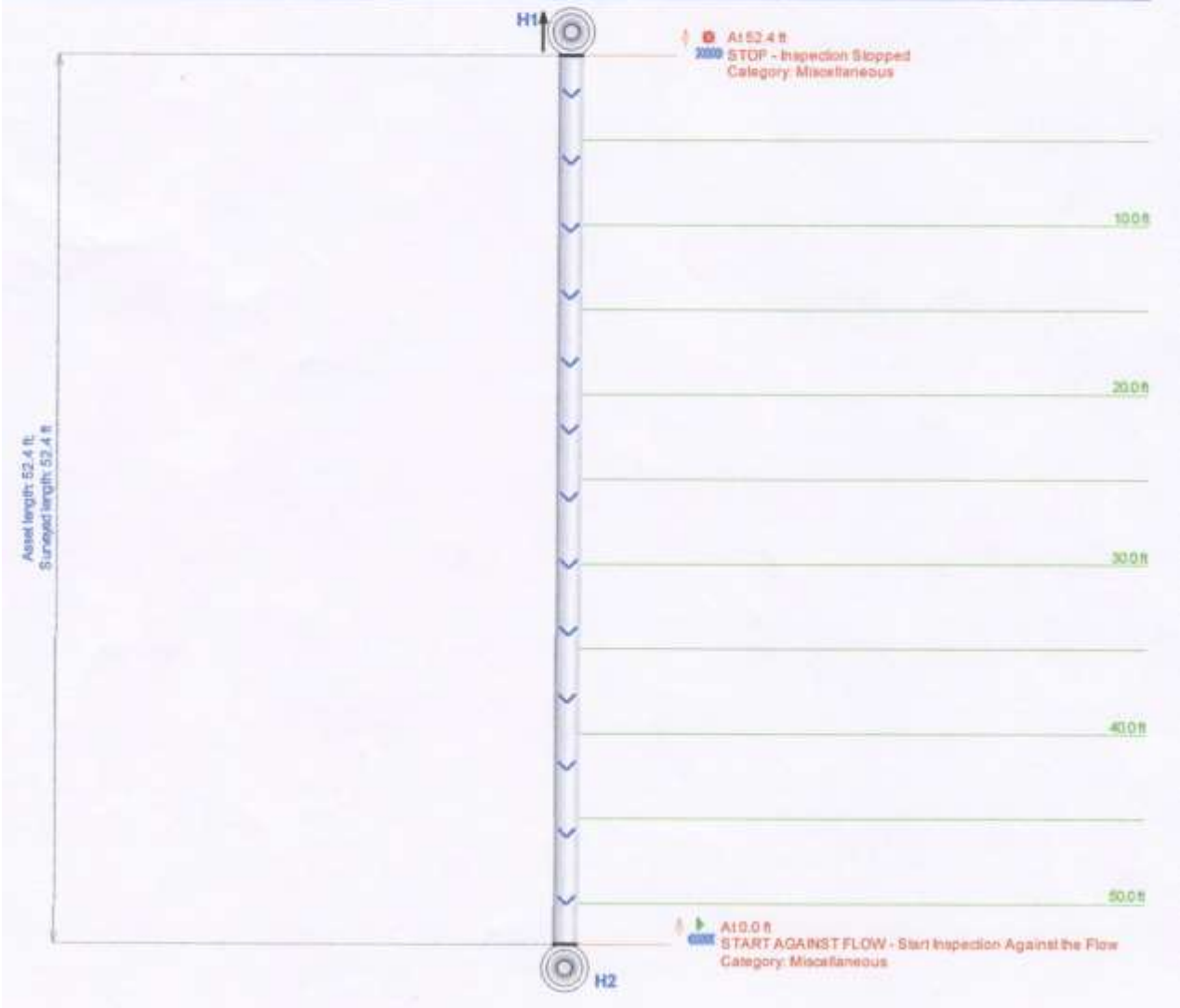
Project Name: <b>HC163-8507 HOT SPRINGS DR.</b>	Mainline ID: <b>H1/H2</b>	City: <b>CYPRESS</b>	Address: <b>8507 HOT SPRINGS DR.</b>		
Start date/time: <b>7/31/2015</b>	Pipe width: <b>6</b>	Pipe height: <b>8</b>	Pipe type: <b>Other</b>	Surface condition: <b>Garden</b>	Weather: <b>Dry</b>
Direction: <b>Downstream</b>	Surveyed footage: <b>49.6</b>	Operator: <b>RICKY JINKS</b>	Comments: <b>LINE DEWPTH 96"</b>		



After Micro-Solve® H1 to H2

Main Inspection with Pipe-Run Graph

Project Name: HC163-DIST. AREA	Mainline ID: H1/H2	City: CYPRESS	Address: 8506 HOT SPRINGS DR.
Start date/time: 10/29/2015	Pipe width: 6	Pipe height: 8	Pipe type: Other
Direction: UPSTREAM	Surface condition: Garden	Weather: Dry	Comments: LINE DEPTH 92" UP STREAM
Surveyed footage: 52.4	Operator: RICKY JINKS		



Before Micro-Solve® H2 to H3

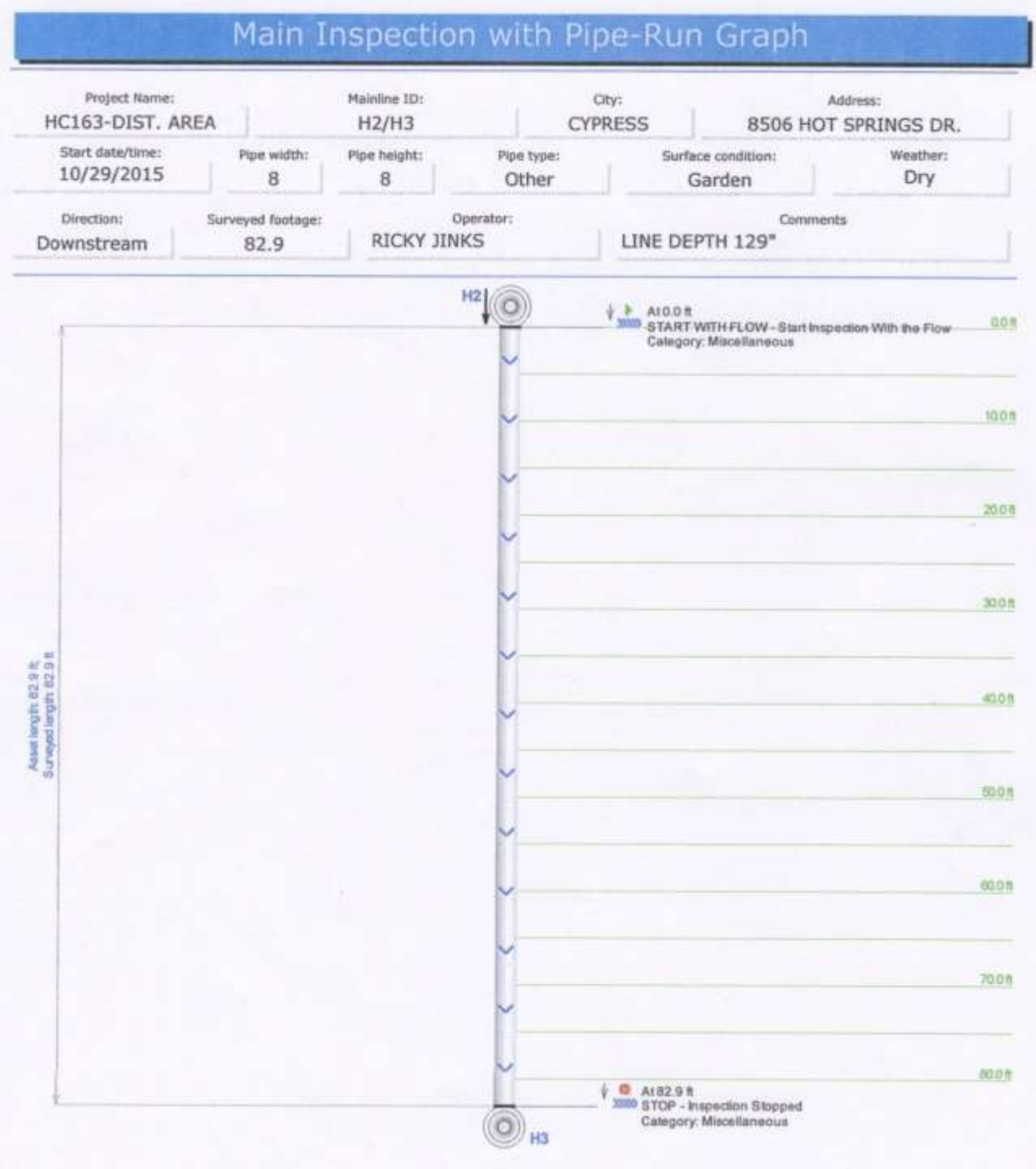
### Main Inspection with Pipe-Run Graph

Project Name: <b>HC163-8507 HOT SPRINGS DR.</b>		Mainline ID: <b>H3/H2</b>		City: <b>CYPRESS</b>		Address: <b>8502 HOT SPRINGS DR.</b>	
Start date/time: <b>7/31/2015</b>		Pipe width: <b>8</b>	Pipe height: <b>8</b>	Pipe type: <b>Other</b>	Surface condition: <b>Garden</b>	Weather: <b>Dry</b>	
Direction: <b>UPSTREAM</b>		Surveyed footage: <b>82.2</b>		Operator: <b>RICKY JINKS</b>		Comments: <b>LINE DEPTH 144" UP STREAM</b>	





After Micro-Solve® H2 to H3

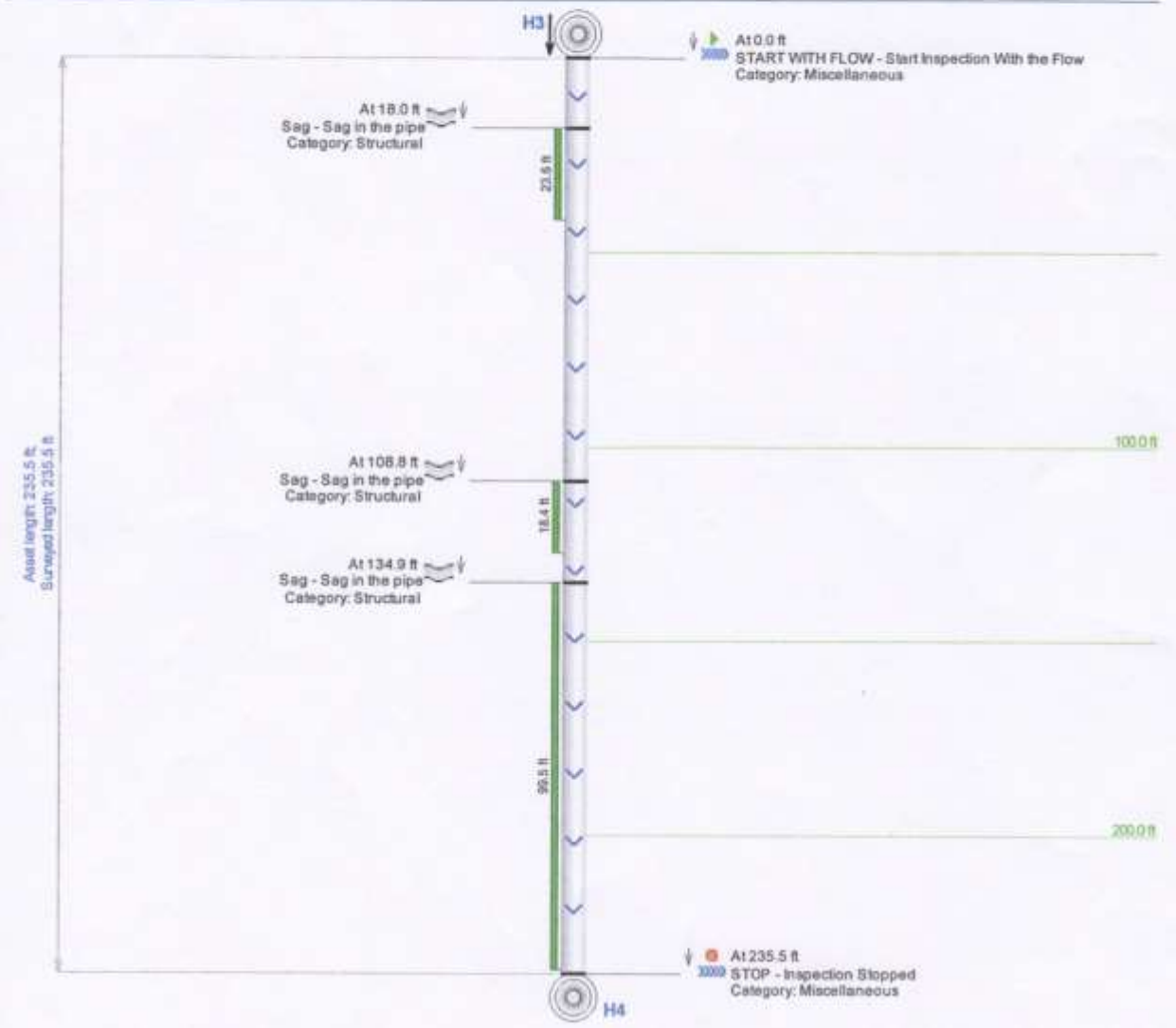




Before Micro-Solve® H3 to H4

## Main Inspection with Pipe-Run Graph

Project Name: <b>HC163-8507 HOT SPRINGS DR.</b>		Mainline ID: <b>H3/H4</b>		City: <b>CYPRESS</b>		Address: <b>8502 HOT SPRINGS DR.</b>	
Start date/time: <b>7/31/2015</b>		Pipe width: <b>10</b>	Pipe height: <b>10</b>	Pipe type: <b>Other</b>	Surface condition: <b>Garden</b>		Weather: <b>Dry</b>
Direction: <b>Downstream</b>		Surveyed footage: <b>235.5</b>		Operator: <b>RICKY JINKS</b>		Comments: <b>LINE DEPTH 144"</b>	



After Micro-Solve® H3 to H4

