

Roots, Rats & Relics

Discoveries Made Possible By The
Utilization Of The Down Well Camera By
Georgia Cooperative Extension

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Due To The Heightened Awareness Of Ground Water Issues

- We needed a way to diagnose
- Elevated bacteria levels
- Turbidity
- Odor
- Well Failure

Pilot Program Developed

- **By University of Georgia Agricultural and Environmental Services Laboratories**
- **Grant Funds Enabled Purchase Of Equipment**
- **Utilized Video Equipment To Perform Water Well Diagnostics**

A New Diagnostic Tool



Well-Vu
An economical, self-contained viewing system ideal for well, or other down-hole applications.

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- Due to the blind nature of the task
- We needed a way to see down the well

Successful Start

- **Subsequent Discoveries**
- **Large Number Of Requests**
- **Led To The Acquisition Of One Well Cam And Supporting Equipment For Each of The Four UGA Extension Districts**
- **Extension Trainings Were Carried Out In Each District To Familiarize County Agents With Operation Of The Equipment**

Many Discoveries Have Been Made!

- After Requesting An Inspection Some Well Owners Wished That They Had Not Found Out What Was Lurking Below!
- Let's Take A Look At Some Of What We Have Found!

Club Soda?



- Gas Bubbles In Drilled Well

Discoveries



- Pine Roots Intruding Into A Drilled Well.

Discoveries



- Wharf Rat At The Bottom Of A Bored Well

Sometimes They Float!



Critters Might Even Be Down There!



- Slug On The Bottom Of A Bored Well

New Discoveries Are Made!



- Unknown Isopod

Sometimes Critters Are Small



- Microbial Colony On Pump Intake

Accidents Will Happen!



- Car Keys And A Cell Phone

Be Careful Where You Flic Your Bic!



Some Wells Seem To Collect A Little Of Everything!



- Refuse On The Bottom Of A Bored Well

Other Odds And Ends

All Ball & Hairdryer



Conclusions

- Contamination Issues Are Not Confined To Naturally Occurring Phenomena, Accidental Introduction Also Plays A Part
- Contamination Issues Seem More Prevalent In Bored Wells In Comparison To Drilled Wells
- Lack Of Understanding Of Well Construction And Proper Maintenance By The Well Owner Has Proved To Facilitate Most Instances Of Contamination. (Pesticides, Fuel Oils, Etc)
- Installation Mistakes And Neglect Of Maintenance Have Resulted In Biotic Contamination

What Have We Learned?

- **Be Careful What You Look For...**

- **You Might Find It!**

Any Questions?

■ **Thank You!**