

Local Limits - Two Treatment Plants

Colorado Springs Utilities
Colorado Springs, CO

WHAT ON EARTH AM I
DOING IN HERE ON THIS
BEAUTIFUL DAY?/
THIS IS THE ONLY LIFE
I'VE GOT!!



The Situation

Las Vegas Street WWTF

- South end of the city
- 75 MGD hydraulic capacity
- 36 MGD of flow currently
- screening, AWT, clarifiers, Cl_2/SO_2

J.D.Phillips WRF

- Upper/middle part of city
- 20 MGD hydraulic capacity
- 8 MGD of flow currently
- screening, AWT, clarifiers, UV

The Situation (cont.)

- Biosolids from JDPWRF discharged to nearby interceptor, then removed by LVWWTF and pumped to Solids Handling and Disposal Facility
- Discreet collection areas
- Liquid Waste Haulers dump at LVWWTF only
- Different stream segments/quality
- Different WQS

The Evaluations

Needed Local Limits Eval for each facility

Most data was different for each plant:

- Influent/Effluent
- Liquid Waste Haulers
- Stream Standards and Water Quality
- SIU data

Some data was the same:

- Biosolids
- Residential/Commercial



Follow the Recipe

It's Easy:

- Plug everything into the spreadsheets
- Get the results
- Decide on limits you want in your code

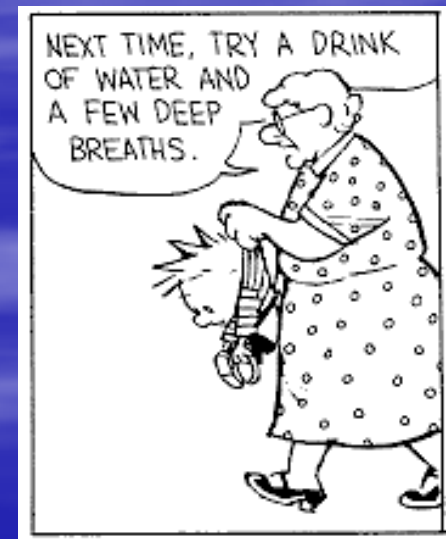


Easier May Not Be Better

You could:

- Pick the lowest values between the two treatment plants.
- Apply the lowest values to both facilities.
- Change the code.
- Change permits.

Celebrate – you're done...



...or are you?

- Boeing
- General Dynamics

High-tech industry [edit]

A large percentage of Colorado Springs' economy is still based on [high tech](#) and manufacturing complex electronic equipment. The high tech sector of Colorado Springs area has decreased its overall presence in the Springs' economy over the past six years (from around 21,000 down to around 8,000), notably in [information technology](#) and complex electronic equipment.^[25] Due to the slowdown in tourism, the high tech sector still remains second to the military in terms of total revenue generated and employment.^[26] It is projected by this trend that the high tech employment ratio will continue to decrease in the near future.^{[26][27][28][29]}

Because of Colorado Springs' central U.S. location, available reserve of highly educated workers, and business friendly climate; several companies have plans to either expand their current operations in Colorado Springs or have considered Colorado Springs as a competitive area for relocating or opening a business.

High tech corporations with connections to the city include:

- [Verizon Business](#) – Software development - Formerly [WorldCom](#) and [MCI](#), has a fairly large engineering presence. At its peak during the mid to late 1990s, with over 5,000 employees and currently has nearly 1300 employees in 2008.^[30]
- [Hewlett-Packard](#) – Computing – large sales, support, and [SAN](#) storage engineering center. The location was built by [Digital Equipment Corporation](#), renamed [Compaq](#) in the 1998 acquisition of Digital, and finally renamed Hewlett-Packard after the 2002 merger. Nearly 1000 positions will be transferred out of the Springs.^{[31][32][33]}
- [SNIA](#) – Computing - home of the [SNIA](#) Technology Center
- [Agilent](#) – Test and Measurement Manufacturing - In 1999, Agilent was spun off from [HP](#) as an independent, publicly-traded company.
- [Intel](#) – Currently idled with 250 employees, down from 1000 employees in 2007.^[34]
- [Atmel](#) – Chip fabrication. Formerly [Honeywell](#). Recently laid off 245 workers and will shut down in 2009.^[35]
- [Cypress Semiconductor](#) Colorado Design Center – Chip fabrication R&D site
- [Sanmina-SCI](#) Closing facility around December 2007 to January 2008 (800 jobs).^[36]

Military [edit]

The United States Military plays a very important role in the city. Colorado Springs is home to both [Army](#) and [Air Force](#) bases and their numerous support bases around the county. Excluding Schriever Air Force Base, all these military installations are on the border of the city, to the north, south and east.



What does it all mean?

How will your new limits affect industries?

- Review SIU data
- Compare to new limits
- Identify potential compliance areas
- Talk to the industries about what a lower limit will mean to them
 - Cost to pretreat (add'l treatment, chemicals, time)
 - Will they stay around, or close shop/move?

Why care about the impacts to local industry and commerce?

- They aren't the "bad guys"
 - City Council cares...a lot!
 - Recession will already hurt industries
 - Maintain revenue for your company
-
- Simple economics: do you want your city to die, survive, or better yet...thrive?

Better Result: Two Sets of Limits

- Developed limits for each facility
- Mapped the collection system
- Identified SIUs discharging to each plant
- Will apply the limits accordingly through appropriate code changes
- Benefit to industries – less \$
- Maintains revenue to Utilities
- Helps local economy (keeps jobs, etc.)

Some Challenges

- Needed to adopt some mass-based limits, not just concentration-based limits
- More work tracking SIUs (location) and allocating mass loading
- Must keep track of collection system activities, changes, and future projects
- More paperwork (annual report implications)

Sell It to Industries

- A lot is out of your hands: water quality standards, permit limits, receiving water quality, removal efficiencies, residential inputs
- Let industries know what you're doing for them
- Help them understand how it all works
- Promote what you've done: goodwill on your part may encourage compliance on their part

Final Thoughts

- Try to be part of the solution, not part of the problem. — Brian Tracey and/or Stephen Covey
- Imagination is our preview of coming attractions. — Albert Einstein
- Do good work. — Todd Dahlberg

Questions?

