

This presentation premiered at WaterSmart Innovations

watersmartinnovations.com





uponor

Commercial Restaurant Pilot Study: The Data

We
mean
progress.

**Santa Fe started with what they didn't
know...**

**We
mean
progress.**

uponor

**Then they started to talk about what they
thought...**

**We
mean
progress.**

uponor

What Santa Fe thought???

- An average restaurant uses **9.9 gallons** of water per meal served
- That equates to an average of **5,800 gallons** of water a day per restaurant
- That is over **2M** gallons of water a year per restaurant
- The United States has more than **675,000 restaurants** and Santa Fe has about 400
- We are not aware of how water flows and **how water loss can be prevented** in restaurants

**Then talked about what they started to talk
about what they wanted to know...**

**We
mean
progress.**

uponor

What Santa Fe wanted to know???

- How much water is used in various types of restaurants (quick serve, coffee shop, a bar, fine dining, etc)
- How much water is being lost due to leaks?
- How much water can be saved with advanced technology?
- Can we change behaviors?
- Can we get buy in from the restaurant community?

**Then they asked how to answer these
questions...**

**We
mean
progress.**

uponor

The intelligence era is making our relationship with water more personal, more visible

3000 - 5000
years



Agricultural era

300 - 500
years



Industrial era

30 - 50
years



High-tech era

?
years



Intelligence era



Phyn Plus

Smart Water Assistant + Shutoff



Monitors leaks anywhere in the home from a single location on the main water line



Automatically turns off water in a catastrophic leak, protecting from costly damage



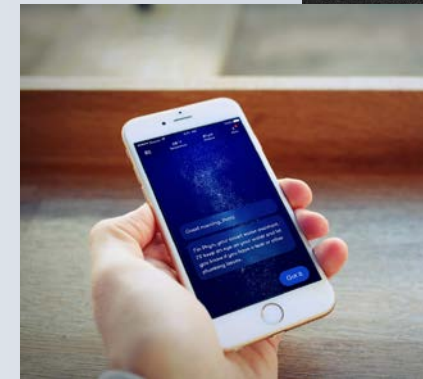
Real-time **mobile notifications** allows homeowners to **remotely turn off water** using the Phyn Plus **app**



Daily system checks inform of smaller leaks and issues before they become larger problems



Understand your **water use**, by staying on top of **how much water your family uses** – and stay ahead of your utility bill.



We then said, let's get started...

**We
mean
progress.**

uponor

We took these steps:

- We need to get **local businesses** involved
- We need to have a **wide variety** of restaurant types
- We need to identify a technology that can **track water consumption, water loss, and leak detection in real-time**
- We need to be able to **track and report** on usage and findings
- We need to have **professionals that can install the devices**
- We need to **make this easy** for the restaurant community

Restaurants:

- Gelato Shop
- Coffee Shop
- Fine Dining
- Pizza Chain
- Breakfast Spot
- Local Café
- Diner
- Margarita capital of Santa Fe

Ground truth sensor system ensures speed and accuracy

Ground Truth is a series of micro-meters that connect to the internet and provide direct water use data for every device.

“If we can't measure it, we can't control it. I'm glad they have finally provided us a method for doing so.”

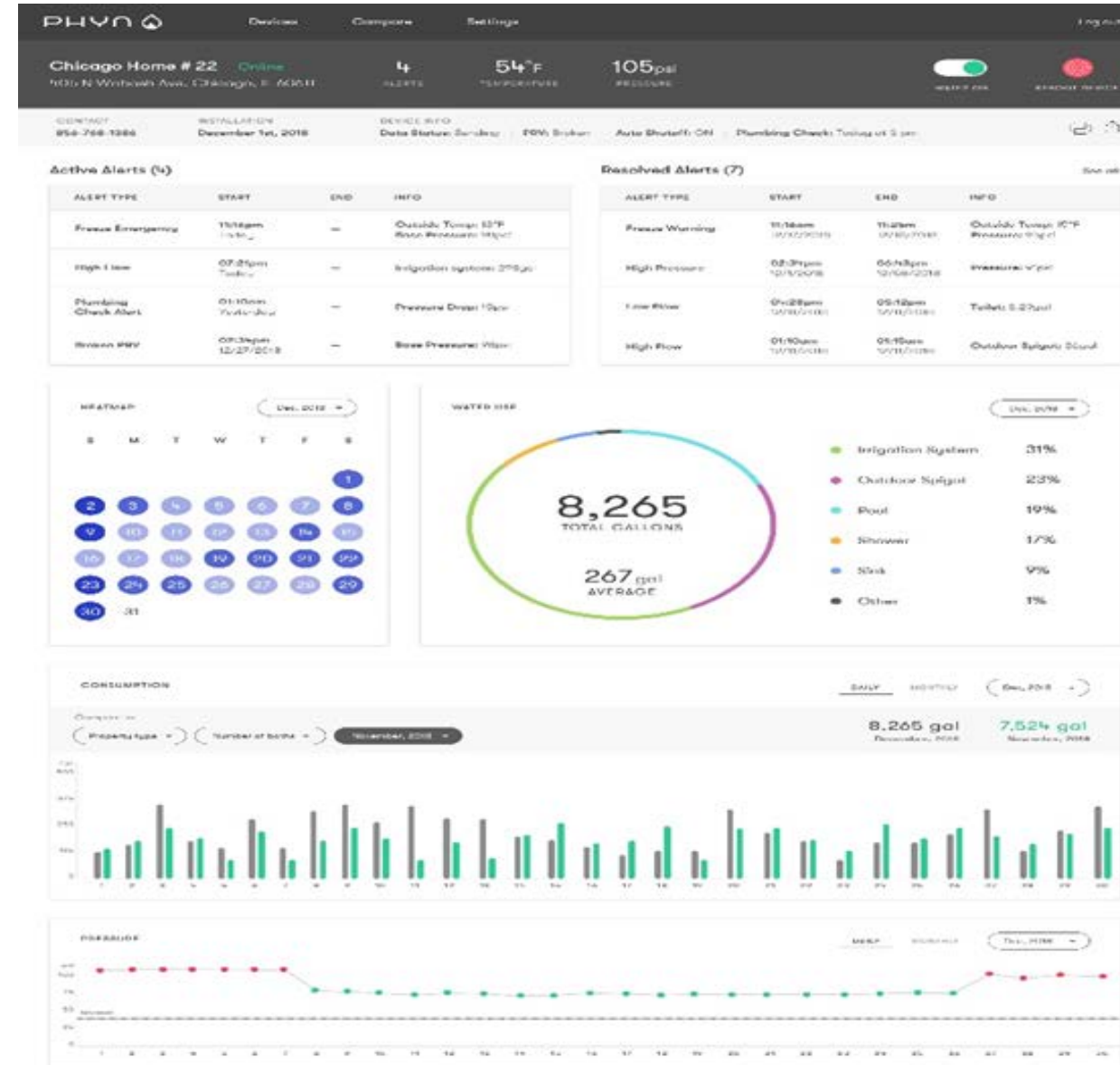
- Roland Richter, owner, Joe's Dining.



Phyn Plus Dashboard

Santa Fe has access to all of the devices:

- Consumption
- Alerts
- Leaks
- Abnormal Usage
- Automatic shut-off activity



Ease of Install

Dedicated network of plumbing professions designed to bring forth Intelligent Water innovations.



Nationwide network of authorized, trained plumbers to promote, sell, install and service Phyn Plus

What we are learning so far...

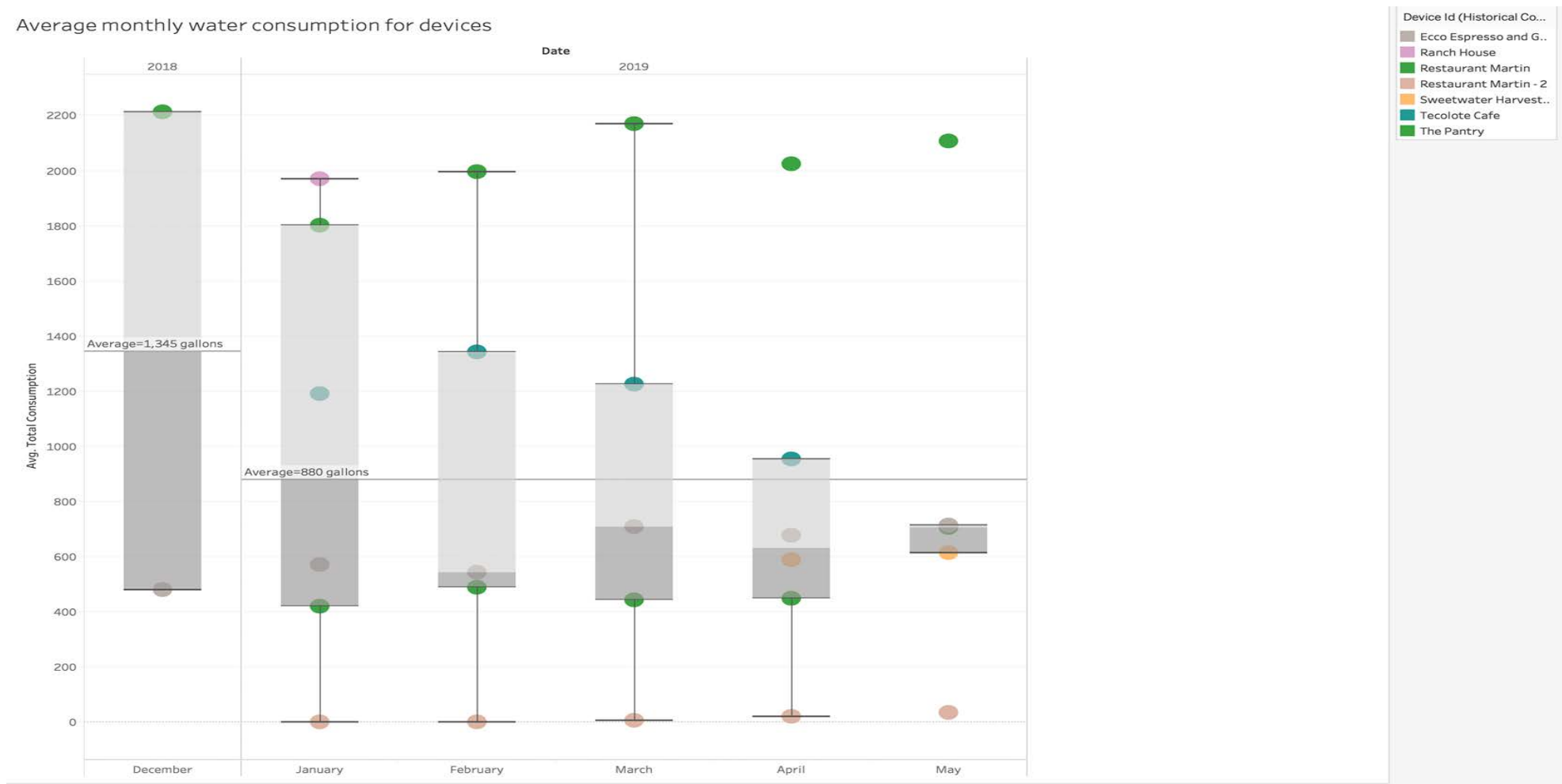
We
mean
progress.

uponor

What we are learning so far...

- Restaurants in Santa Fe use less water than the national average;
- An average coffee shop can **flush the toilet 100x** a day using more than 57k gallons of water a year;
- A busy restaurant can flush the toilets up to **500 times a day** using more than 285k gallons of water a year;
- A kitchen sink can **leak 3,400 gallons** of water a year if no corrective action is taken
- Data **will change behavior**... the restaurant owners are living proof.
- The Santa Fe restaurants owners believe that with the data and Phyn Plus they can reduce their water usage **by up to 20%** (they believe this will be 25% -35% in the end)
- Santa Fe restaurants use over **635 Million gallons** of water a year
- A twenty percent reduction in water usage within restaurants would save **more than 120M gallons of water annually**

Water Consumption is going down...



So now what...

We
mean
progress.

uponor

Next Steps:

- The City of Santa Fe passed an ordinance to give a credit to restaurants that install this device (approximately \$400)
- The restaurant will also receive a full water audit;
- They are expanding the pilot into a Phase 2 (more restaurants, more light commercial)
- The ROI for the product and installation is projected to be less than 6 mo.
- Goal to have in 300 restaurants in next 12 months
- We just trained 25 Uponor Pro Squad members to help make this a reality
- They are exploring the next frontier for commercial water conservation...

Our relationship with water is changing



- **Lack of access** to data perpetuates the waste
- Recognize in our era of intelligence **innovations are disrupting the plumbing industry** and changing our relationship with water
- Check out **emerging technology** to help remove barriers for using, monitoring and conserving water
- **The Next Frontier** we need to stop thinking about water in our homes and think about water in our communities
- Begin **making a difference** today

Thank You

Ann Reynolds, Strategic Consultant, Intelligent Water
ann.reynolds@uponor.com