

# SUMMARY OF SURVEY RESULTS & DATA FROM WINTER MAINTENANCE COURSE: Parking Lot & Sidewalk Maintenance

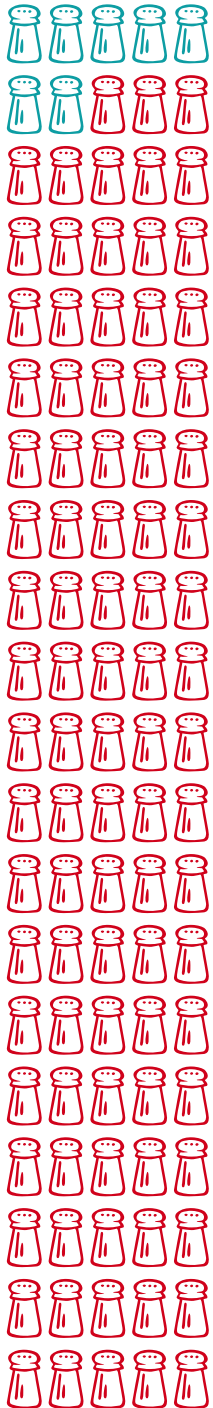


Course taught by Fortin Consulting, Inc

July 2019

Report prepared by PWC Risk & Wellness Services

## Too Much Salt!

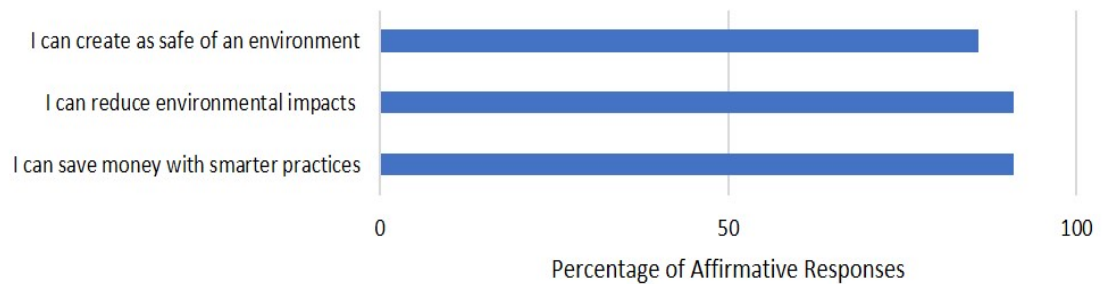


For every 100-lbs we used, we should have only used 7-lbs

## GAME-CHANGING TAKE-AWAYS:

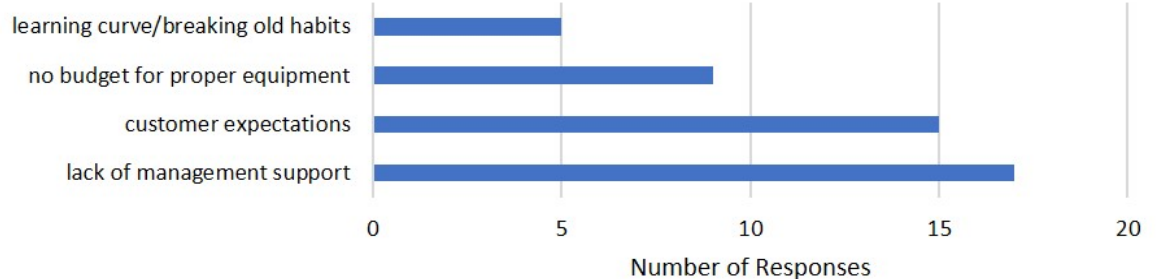
- Over-salting does not speed melting, it just pollutes
- Salt does not get filtered by soil and once it enters waterways it never leaves or breaks down, permanently contaminating our drinking water supply and damaging the environment
- For every ton of salt applied, infrastructure damage amounts to \$800 - \$3,000
- In PWC, we should be using sodium chloride most, if not all, of the time (calcium and magnesium salts are effective at temperatures lower than we usually experience)
- Application rates can vary as much as 50% between identical pieces of equipment, making calibration critical (less than 10% of class participants reported having calibrated equipment)
- Surface temperatures should be measured to determine course of action, never air temperatures
- Salt and sand should not be mixed, it makes both less effective
- Anti-icing (liquid brines) is the most cost-effective and environmentally safe practice for winter maintenance; it can be done ahead of storms and prevents ice from bonding to surfaces

Participants' Confidence for Change with Smarter Practices



Barriers to Implementing Improvements

Most Common Write-In Responses



## **COURSE STATS:**



**70  
Participants**



**5-Hour  
Course**



- **100% Found the Class Useful**
- **100% Would Recommend Course to Others**
- **96% Passed Exam and Obtained Certification**

## **VENDOR INFO:**

**Fortin Consulting, Inc. are national experts on salt reduction strategies. They developed this Winter Maintenance certification program for the Minnesota Pollution Control Agency and provide this course, and more advanced ones, throughout the midwest. Their visit to Prince William County was their first on the east coast.**

## **NEXT STEPS:**

**Risk & Wellness Services, Public Works Buildings & Grounds, Public Works Property Management, and Parks, Recreation & Tourism are planning for pilot programs to implement techniques learned from this training. Aspects of the program include:**

- **Calibration clinics to assist personnel in calibrating equipment**
- **Brine solution pilots at several facilities**
- **Written Standard Operating Procedures for winter weather response**
- **Outreach events and communication plans to engage all County personnel and set expectations for response to winter weather**