Storm Water Impacts- Ice Melt

Winter in Montana proves to be a unique environment to manage storm water. While it may not seem like it, snow melt is technically storm water. The frozen ground resists infiltration and increases runoff. The runoff then collects pollutants and takes them to Malmstrom’s storm water system which discharges to the Missouri River. One way to limit storm water impacts is to consider the amount and type of salt you apply to pavements around your home and building.

Using salt is an excellent way to reduce ice and increase safety on walkways. Many of the ice melt products you find at your local grocery or hardware store are composed of sodium chloride. Sodium chloride can be harmful to pets, is only effective down to 20°F, and is worse for water quality than other salt compounds. There are other salts on the market that do the same job (some even better) and are more environmentally friendly. Magnesium chloride in particular is used both on and off base to protect the roadways from ice. Magnesium chloride is effective to a lower temperature and releases less chloride ions to the environment. Other alternative, but less common, salts include calcium chloride and potassium chloride.

It is also important to apply the correct amount of salt to driveways and sidewalks. Before you apply salt, shovel as much snow and ice off the surface as possible. If there is still a slip hazard, apply salt according to the recommendations on the package. Applying too much salt can stain clothes, kill grass, and contribute to corrosion on unprotected metal.

This winter be sure to check the label when stocking up on salt and apply salt only after you shovel.

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