



## The Trade-offs of Snow Removal



Figure 1



Figure 2

In Montana, we spend a large part of the year with snow on the ground – snow that needs to be removed from your airport pavements. How do you balance caring for your pavement with thorough snow removal?

While the use of a metal cutting edge on your snow plow does remove snow more efficiently and effectively than other blades, it does scrape and wear the pavement. Carbide edges can cut rocks and asphalt binder from the surface and gouge at any bumps and dips. Damage from overly aggressive snow removal can be seen in the Figure 1 and Figure 2. If you use a carbide or carbon steel cutting edge, you may consider scheduling more frequent maintenance projects. The metal blade does tend to wear away the pavement surface and paint more quickly.

Poly or rubber cutting edges are much easier on your pavements. Unfortunately, these blade edges are also not as effective at removing all of the snow from the pavement surface. They can leave a thin film of snow, and they ride up over ice. While they also wear faster than their metal counterparts, the replacement costs could be cheaper than the costs of extra pavement wear.

Other snow removal options include sweeping, blowing, and chemical de-icing. Maintenance personnel at Montana's primary airports and your engineer can provide insights and options for purchase of FAA-eligible snow removal equipment.

Your pavement surface and painted markings can last longer with less aggressive snow removal techniques.

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