

Does MulchMax have to be sprayed at the 5000 Kg/Ha rate to provide equivalent performance to other mulch?

MulchMax has been formulated to provide better erosion control and germination performance at the same application rate compared to the leading mulch in their class. The 5000 kg/Ha optional rate is a performance advantage unique to MulchMax and provides a guarantee of full soil coverage for maximum soil protection. Real world soil surfaces are seldom smooth and often require more mulch than originally specified, even with the best installers. Other mulch companies cannot specify higher rates without sacrificing germination. This is the MulchMax advantage.

I am used to mulch looking fluffy and thick when I spray it. Why does MulchMax look thin and does this impact performance?

MulchMax was designed by completely re-thinking the key elements behind mulch performance. MulchMax deliberately contours to the soil surface in a thin, extremely strong layer that maximizes seed to soil contact, and seals moisture in the soil itself. This maximizes erosion protection, while providing a better environment for seeds to establish as the emerging seedling roots have a much better chance of reaching and rooting in the soil itself rather than being stranded in the mulch. Having the mulch lay down in a thin layer has the added benefit of providing less of an environment for airborne weed seeds to be captured by the mulch. This reduces the competition desired plants face once they germinate.

Why is there paper in the MulchMax? Since you are using recycled paper, can I expect the occasional piece of plastic?

Recycled paper is included in many MulchMax formulas for the unique performance advantage it provides as part of our mulch blend. We simply have not been able to find an alternative that matches paper performance. As a wood cellulose fiber, recycled paper is natural and biodegradable. The flat surface paper provides acts as a barrier to moisture loss on the soil surface, yet remains soft enough for seedlings to push through during germination. Recycled paper also mixes easily and helps MulchMax provide a consistent, easy to spray slurry. We use premium recycled paper in all of our MulchMax products which is sorted at least twice prior to bagging, making plastic contamination an uncommon occurrence. Unfortunately, with all recycled paper products it is impossible to eliminate all contamination; however, this should not impact the performance of MulchMax.

Why doesn't MulchMax use wood fiber like most mulch since it is commonly specified?

MulchMax mulches are a blend of three fiber types: short stem fibers similar to wood in function, wood cellulose (paper), and bast fibers. We believe a blend of fibers with different performance characteristics will always be superior to a product based on one fiber type. The key to our mulch performance is the bast fibers. Bast fibers are extremely strong plant fibers found only in a few plants throughout the world. Bast fibers are longer, stronger, and more flexible than wood fibers, which allow them to drape over soil and contour more readily and reinforce the soil in a way short, stiff fibers like wood cannot. The performance advantage of bast fibers has been known about by the erosion control industry for decades but their strength and flexibility make them notoriously difficult to process. Our unique manufacturing facility has been designed specifically to process bast fibers for erosion control. This is a major part of the MulchMax advantage.

How is it possible the MulchMax requires so little water to spray compared to other mulch?

The bast and stem fibers in our MulchMax blends are not thermo-mechanically refined like wood fibers. The thermo-mechanical refining process used to manufacture wood mulches opens the structure of the wood fibers, making them much more absorbent than what they would be naturally. This causes the fibers to swell in the presence of moisture, reducing the amount of mulch that can be mixed in a tank, and potentially causing plugging. There is an inverse relationship between the water holding capacity of a mulch and the amount of mulch that can be mixed in a tank.

MulchMax has lower water holding capacity than wood mulch. Isn't high water holding capacity needed to help with seed germination?

This is a similar issue to the previous question. Mulch water holding capacity and tank mixing ratios are inversely related. Since our mulch absorbs less water, we can fit more mulch in a tank. The amount of water needed to germinate seedlings also needs to be placed in perspective. Applying 3000 Kg/Ha of wood mulch to a site with a water mix ratio of 125 gallons per bag, means that 16,500 gallons of water are required per hectare, at least 20% more than is required for MulchMax. This same 16,500 gallons of water, equates to only $\frac{1}{4}$ of an inch of rainfall/hectare. This certainly helps germination, but is not enough to sustain germination. Our philosophy is that a mulch should allow water through and lock it in the soil itself where we want the roots to grow. This does not happen if the mulch absorbs the water before it reaches the soil itself. We also believe that the lower water holding capacity of our mulch provides an erosion control advantage to the customer. More absorbent mulches are simply heavier during rainfall and therefore face more strain on their interlocking fiber/tackifier bonds.

Is there Guar in MulchMax tackifier formulas?

Guar is a key component of our tackifier formula, but not the only component, like the mulch itself we believe that a blend of polymers can provide a better, more rounded performance than one ingredient alone. We use a blend of natural plant-based polymers in our tackifier that allow us to exceed the performance of guar alone. Our tackifier formula has also been customized to our fiber blend for optimal performance but can be used with other fiber types as well.

I have tried single step applications (mulch, seed, fertilizer) in one pass before with little success. How is this possible with MulchMax?

MulchMax requires less water per bag of mulch than wood mulch and does not swell like wood mulch. This enables us to apply more mulch per hectare with significantly less water. Too much water can cause the mulch to peel and roll downhill. Since our mulch does not swell like wood mulch, it also suspends fewer seedlings in the fiber matrix. These two factors together allow the ability to be applied in a one-step process leading to significant cost savings. It should be noted that within the one-step process, we still recommend applying the mulch from two different directions to maximize coverage.

MulchMax FAQ

MulchMax 101wood contains wood fibers and not wood cellulose like the other MulchMax products. Are there any differences in handling or mixing I should be aware of with MulchMax 101wood?

MulchMax 101wood is designed to provide a cost effective wood mulch option for basic hydroseeding projects and to provide excellent ground coverage at low application rates. MulchMax 101wood is composed of a proprietary blend of wood and bast fibers, which allow customers to have the look of wood while retaining the MulchMax advantage of the bast fibers. As a wood mulch, MulchMax 101wood will swell more during the tank mixing and installation process. Wood fiber swelling can lead to hose plugging similar to other wood mulches, so it is recommended that installers treat MulchMax101wood like other wood products and refrain from allowing the mulch to sit in hoses or pipes for extended periods of time.

For more information on MulchMax visit <http://nilex.com/products/mulchmax> or call 1.800.667.4811