

Effects and Remedies for Frost Damaged Hydrangeas

by Elaine Homstad, Fairfax Master Gardener

When your hydrangeas broke dormancy in March, you probably marveled at the quick growth of foliage, especially on your *Hydrangea macrophylla* (Bigleaf) and *H. quercifolia* (Oakleaf). Then April arrived and instead of bringing showers, it brought frost. And with it, blackened, shriveled leaves to your hydrangeas.

According to the National Weather Service, damaging cold temperatures of 27, 24, and 25 degrees Fahrenheit were recorded at Dulles Airport from April 5 to April 10. This followed the second warmest March on record. Two days in March saw temperatures reach the 80s.

The worst damage was done to the *H. macrophylla*s. These are the “Bigleaf” hydrangeas, which include both mophead and lacecap varieties. They bloom on old wood, meaning they set buds on last year’s growth. The ever-blooming Endless Summer series are also included in this group, because they have a mix of both old and new wood that will set and deliver blooms.

H. quercifolia (the Oakleaf variety), although old wood bloomers, are among the hardiest of hydrangeas and, therefore, suffered little or no damage from the frost. Additionally, the climbing hydrangeas, another hardy variety, suffered no damage.

The so-called “new wood” hydrangeas — those that bloom on this year’s growth — had not begun to grow enough to suffer any damage. These include the *H. arborescens* ‘Annabelle’ and *H. paniculata* ‘PeeGee.’

So now what? Should you cut back the plant to remove the damaged foliage? Will you get new growth? What about blooms? These are all heart-wrenching questions for the hydrangea-philosophers among us. We have some advice.



photo: by author

Figure 1. Damage on *Hydrangea macrophylla* ‘Bailmer’



photo: by author

Figure 2. Damaged foliage and bud on *H. macrophylla* ‘Bailmer’



photo: by author

Figure 3. Damage and new growth on *H. macrophylla* ‘Bailmer’

First, inspect thoroughly. You need to determine the type and extent of the damage before you pull out those pruners. You are looking particularly for both browned or blackened leaves and buds, and especially for signs of life and growth, even on damaged foliage (Figures 2, and 3).

Second, help them recover. Virginia Tech professor of horticulture Alex Niemiera advises that gardeners water deeply any hydrangeas that have been damaged. Hydrangeas are sensitive to lack of water, according to Niemiera, and this has been an unusually dry spring through the end of April. The hydrangeas may also need to be fertilized based on the results of a soil test. Hydrangeas putting on a second flush of foliage are using stored carbohydrate resources to do it. In order to

recover fully, they need water and nutrients.

Third, wait and watch. David Yost, of Merrifield Garden Center, wisely advises,

"I think it is too early to determine the full extent of damage and have been advising people to leave their plants alone for now. If by mid May they do not see any signs of recovery, then they should remove any dead branches. I had an interesting hydrangea sample yesterday. The flower bud on one side of the twig was alive and opening. On the other side of the twig, 3 inches away, the flower bud was dead. Pruning now may cause people to remove viable buds and deprive them of another year's blooms. Gardening teaches us patience."



photo: by author

Figure 4. Prune just above the undamaged foliage

Fourth, prune carefully. If you choose to prune, ONLY remove the parts that are completely damaged, making your cut above some of the undamaged foliage or buds (figure 4). Based on the results of your inspection, you may find damaged outer leaves, but new buds lower on the plant (Figure 5).

Anecdotally, I have all the hydrangea varieties in my garden. Of my "old wood" varieties, I covered one of my 'Bailmer' hydrangeas of the Endless Summer series, in anticipation of the freeze. However, it was still affected by the frost and right now looks a bit ragged and pathetic.

I did not cover my numerous lacecap *H. macrophylla* 'Tokyo Delight', which are in a more sheltered part of the garden. For them, most of the damage is at the top, and there is budding and new growth at the base and lower part of the branches. The bad news is that the damaged parts are not going to flower this year. It is old wood, and it set its buds last year for this year. But the good news is that I see foliage and new green buds, even though the larger more developed leaves are dead black crinkly messes, so I will leave those branches alone for now. Then, within the next 3 weeks I will be able to better assess if and where to prune.

Hopefully, the frost that caused the damage, while unusual, may not deprive us of all blooms this year. However, depending on your situation, you should probably expect a decreased output.



photo: by author

Figure 5. Signs of hope. New growth on 'Tokyo Delight.'