

# Impacts of the April 2008 Frosts on Oak Mast Production

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Below freezing temperatures during the first weeks of April have brought concerns for many forest and wildlife managers across the state. The Easter freeze that was experienced last year certainly provided plenty of reason for concern. Total oak mast failure was experienced in many portions of the upstate last year. Wildlife populations were left searching for food like I have never seen before.

The Easter freeze last year was a disaster for oak reproduction. The state experienced above normal temperatures in late February through March. Oaks put out leaves and reproductive structures earlier than what is normally expected. Temperatures then fell down into the teens in many areas and stayed there for a while. The sustained well below freezing temperature took a toll on the fruiting structures of oaks.

Conditions this spring appear to be much different than what was experienced last year. Temperatures have been near or below normal with very few above normal temperature days having been recorded. Trees did not begin to green up and put on fruiting structures as early as they did last year. Another major difference in the frosts experienced this April is that temperatures were just barely below the freezing mark (30-31° F) and were only that low for short periods of time.

While there may be some damage to the acorn crop from this year's frost, I don't anticipate it to be nearly as severe as what was experienced last year. Red oak masts will

most likely be low this fall as it takes red oak acorns 2 years to mature and fall. The ones fertilized last year would be expected to fall this year, but given the severity of last year's freeze very few of those acorns are likely to have survived in the upstate.

It is still too early for us to know exactly what the impacts of the April 2008 frosts will be. If you are curious about the impacts on your property, a mast crop survey can provide you with the answers. Mast crop surveys are very simple to conduct. In mid to late summer take a walk through your hardwood stands and use binoculars to scan the canopy looking for acorns. Most of us are in the woods at this time of year as we begin scouting for deer and planting food plots, and a little extra time in the outdoors never hurt any of us.

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