Gnats were reported as a major problem for many when BBRP began receiving 2019 trail reports last fall. Some offered their solution of spraying the nest and chicks with vanilla, which acts as a good mask to the CO2 given off by them and adults. Those who used the vanilla reported good success with chick survival, however there was no definitive guideline as to how often to spray. Some said once chicks hatched they sprayed on their regular weekly nest visits. Others wanted to insure no harm would come to the chicks so they resprayed every other day. One thing was, for certain, it was effective as no chicks were lost when spray was applied.

This sounds like a great solution, however not everyone can monitor their trail every week; some monitor every 10 days or even every other week. We know reduced frequency of monitoring can be a problem for chick survival during gnat season. Carrol Johnson, BBRP's statewide coordinator, falls into the category of not always able to get to his trail every week, so he came up with an idea for a more long term masking solution. He had used a car air freshener in his truck and realized over time it lasted all summer long, so he thought why wouldn't something like that work in a bluebird nest box. The problem was how to hang a 'tree' shaped car air fresher in a nest box.



His nest box of choice is the Gilbertson PVC which has a small pilot hole on the underside of the roof making it very conducive for a small screw. With that he thought it would be a perfect spot to attach the scented tree. So off to the car parts store to purchase several scented trees. Wouldn't you know they even had them in vanilla scent. Perfect!



However, a small problem existed as the tree was a little longer than the space on the underside of the roof. So a little tree trimming was in order; not the kind we do for Christmas, rather it needed to be shortened a bit. Remove the string, cut off the top and screw it into the hole, which works fine with the older style wooden roof boxes.



One more hurdle had to be cleared with the latest version of the Gilbertson PVC box. The new ones now have a PVC board as the roof, which lasts much longer than wood, but also is much denser and harder to insert a screw. The solution was to install a moly in the hole, screw through the scented tree and into the moly, problem solved.



As a trial Carrol had several friends try his new gnat deterrent solution in different areas of southeastern Minnesota with very positive results. Not one chick lost!

Actual results from Fern Vesledahl of Nerstrand, MN using Carrol's 'tree' deterrent for the 2020 season said, "I had installed the vanilla tree at 8 different sites on the trail around my area. I was surprised by how long the vanilla fragrance lasted. It lasted through 2 nestlings and still I could smell the aroma. During the trial time I did not spray any additional vanilla on the nestlings. All chicks remained safe from the gnats and successfully fledged. I feel this helped deter the gnats and kept the chicks' safe between the times of weekly checking." She adds, "I'll definitely use this next year!! I ordered my vanilla tree off the internet. It will be a good thing to do on a cold winter day, to get ready for another nesting season."

Carrol's other test person was Houston county coordinator, Mike Jeresek. This is what he had to say,"

1. I had to trim the trees a bit to have them fit inside the bottom of the roof inside the box. 2. Secure the tree with a 1/2" sheet rock screw to the bottom of the inside of the roof. 3. No need to add any additional spray to the tree. My results were that the four boxes I used only the scented trees to prevent gnats were all successful in fledging bluebirds with zero gnat problems this season. In S.E. MN gnats are generally bad from late May thru mid-July. I will be putting the scented trees in boxes starting in mid-May next year."

An additional 2021 variation on the scented tree installation is much simpler and should be just as effective. Simply paperclip the scented tree or even a half to the back of the nest box as seen here.



If you have wooden boxes simply staple or tack it to the inside of the door just below the entrance hole.



If you have a good idea like these and want to talk it over with Carrol or have questions about the scented tree application described here you can call him at 507-649-0126 or email him at mnbluebirder@hotmail.com.