Florida Torreya Relocation Project At Stovers' Sèjour in Greensboro, North Carolina

An initial planting of 30 Florida Torreya seeds was completed in mid-November, 2013 along the ½-mile Universe Story Walk trail in 5 acres of upland woodland across I-73 near the Piedmont Triad International Airport in Greensboro, NC. The first autumn photographs in each section of this report were taken during the original planting. Cursory examinations during 2014 showed no indication that any seeds had germinated. During an inspection tour in November 2015, six plants were noted and reported to Connie Barlow.

In May 2016, Nelson Stover and Michael Dowd conducted an in-depth examination of all planting locations. Three documentable plants were photographed – these are included in this report. The following day, in brighter sunlight, Nelson returned to the two sites in the valley. There he discovered the nubs of three additional plants. These are the ones found in November 2015 but not the following May. It appears that the leaves of these three plants were eaten by deer or other small animals which are prevalent in the woods.

In November 2016, Nelson and Elaine Stover revisited all the planting sites. This report has been updated to include their findings. Ten of the 30 seeds had sprouts that remained visible; a germination rate of 1 in 3. During this audit, a grid was placed behind each seedling to show its size. The boxes on the grid are 2" wide and 3" tall.

This report includes photos from November 2013, May 2016 and November 2016. Some notes about specific disturbances to particular sites are also noted where applicable. In each of the original planting photos, Elaine Stover is holding a small trowel which shows the exact location of the planted seed. The Universe Story Walk consists of 20 markers spaced at 100' intervals through a wooded area – these represent the billion-year history periods of the history of the Universe.

The marker for 14 ¾ billion years lies at the bottom of a small valley. The tree canopy covering this valley was decimated by a tornado in 2008. The stream which has its headwaters at a spring near the marker has been dry since the cut was made for the nearby highway (I-73) in 1994. However, the fertile ground does collect water from the neighboring higher ground. In this area, two clusters of 5 Torreya seeds each were planted. Some of the initial sprouts in these clusters can no longer be found. The photos of these areas are shown in the following pages after the 14½-year marker and are labeled "Valley South of the Trail" and "Valley North of the Trail".

In late 2015, an additional 20 seeds were planted on the same property. The documentation of these plantings is not detailed in this report. A recent general observation concluded that none had germinated by November 2016.

For further questions about these plantings, contact Nelson Stover: <u>NStover@EmergingEcology.org</u> or phone (336) 605-0143.

Updated: November 27, 2016

Marker 0 – located near the front of the Stover's house.

Three large pine trees near this planting became infected with pine bark beetles in the fall of 2015. The trees had to be cut down. The area was repurposed as a sitting area and fire pit after the trees were removed and the yard was fenced in for the dog. The exact location where the Torreya seed was planted is still visible (see photo below right), but are not well protected.



Photo left – original planting, Nov. 2013. Photo below: repurposed area, May 2016 (note, log on ground at right is in the center of the original photo.



Updated: November 27, 2016

Below: Nov. 2016 photo showing fully planted "Anniversary Garden". Torreya seed is in the approximate center of the photo under about 6" of dirt.



Marker 0 has been relocated and no Torreya seed is located near this new marker.



Note: due to a realignment of the trail this marker was moved 10' south; the tree seed was not adjusted.





This seedling had become visible by November 2016.







Left: Nov. 2013

Below: Sprouting, Nov. 2015, hands of Elaine Stover.

Note: This marker is located just to the west of the driveway into the Stover Sejour. This is at the lower end of a sloping property with trees to the south and an open area to the east and north.



Photo above: Michael Dowd with tree at Marker 4, May, 2016.

Photo right: Tree enlarged, hands of Michael Dowd.



Updated: November 27, 2016

Above: Tree at Marker 4 stands about 6" tall by Nov. 2016.





Below: Visible Seedling, Nov. 2016.





Above: Original planting location. Below: Seedling in Nov. 2016.





Marker 8-9





Marker 11





Marker 13





Marker 14 1/4



Above: Original planting. Below: Seedling in Nov. 2016.



Marker 14 ½



Note: Behind Elaine the ground slopes into the valley which was hit by a tornado in 2008. The "valley plantings" are down and to her right.

Valley North of Trail



Above: Planting area for 5 seedlings

Right: Michael Dowd with larger of two trees, May, 2016

Below: Second tree in this cluster, May, 2016.





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During the survey of November 2016, three trees were found in the cluster of seeds planted north of the trail.







Valley South of Trail



Above: Planting area for cluster of 5 seeds south of main trail in the valley. Rocks were placed near each seed location around a central pole.

Below: Possible nub of tree, apparently eaten between November 2015 and May 2016. No signs of these trees were observed in Nov. 2016 (this may be a favorite deer sleeping place).



Marker 14 ¾



Above: Original planting site. Below: Seedling in Nov. 2016.



Marker 14.9



Marker 14.99



Final Marker

Right: Original planting. (The Stover's house is 20' in front of Elaine at this point in the trail.)

Below: Seedling during November 2016.



