

# Emerald Acres, Oklahoma

Freedom Farm Academy

## Design 9



### Designed by:

Lindsay -Head of Designs, Graham-Project Manager, Mike-Plant List,  
Annette Argabright-Designer, Cynthia & Graham-Narrative

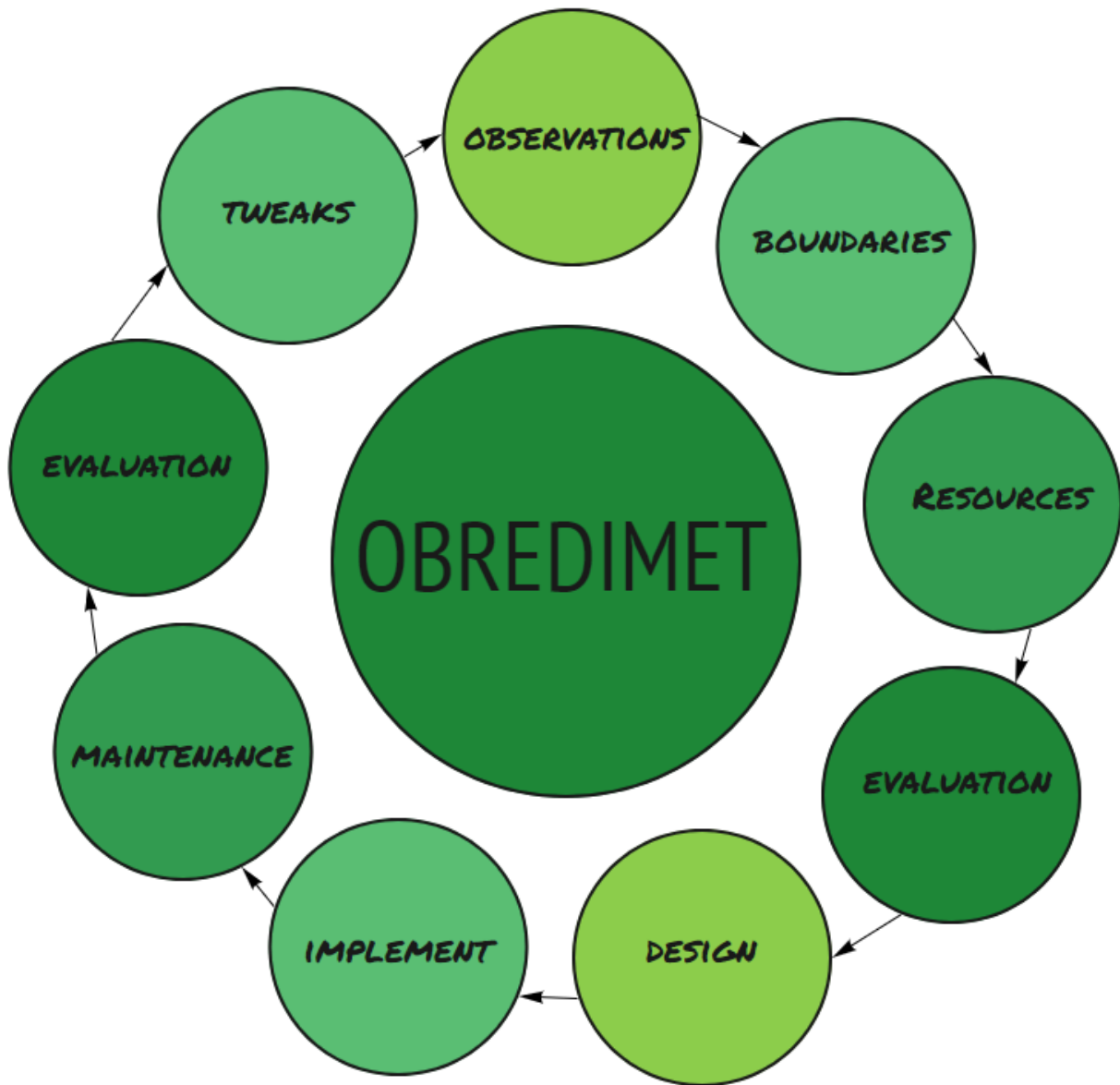
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Beginning Date: March, 2023

Completion Date: June, 2023

# Framework



In 2022, Food Forest Abundance designed a property in Chiang Rai, Thailand. This property became an income producing and teaching facility that encompassed all three ethics of earth care, people care, and fair share. The concept of the property became a design product known as a [Freedom Farm Academy](#) (FFA2). My favorite piece is the “people care” that is within the Freedom Farm Academy. It encourages connections, education, inner growth as well as the growth of food and products.

The name, Emerald Acres, evolved during the design process. Angi, the property owner, loves the emerald green moss that covers the ground. From that point on, we referred to the property at Emerald Acres.

This design, along with 3 others, were the pilot designs, to create a written process for FFA2 design. Teams were chosen for each of the designs, and I was designated as the designer/renderer for Emerald Acres.

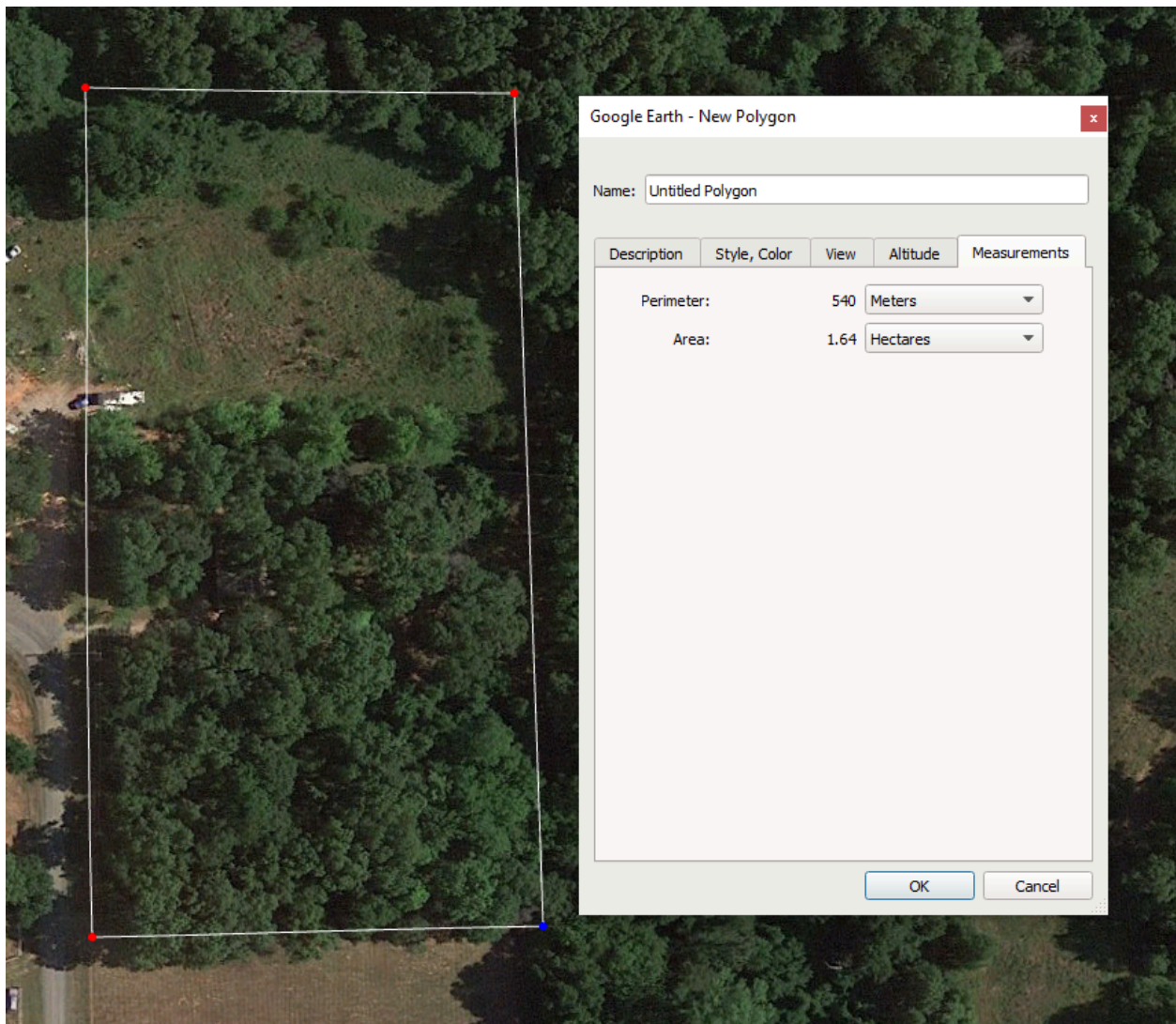
## **OBSERVATIONS**

Lindsay, head of designs, conducted the [original client interview](#) and shared the recording with the rest of the team (video cannot be included). Her tasks also included creating the processes for future FFA2's, with our input.

Listening to the interview, rather than being a part of it, led to a feeling of disconnect with the design. However, I was able to learn the steward's (client) vision, the elements they were looking to include in the design, their source of income from the property, and the wildlife and water flow. Several photos were included for the team to study. We

refer to our clients as stewards as we are guiding them to be good stewards of the land.

Emerald Acres, named for its lovely green moss, is about 4 acres or 1.64 hectares. The stewards (client) have lived there for a few months, as of the beginning of the design process, and are eager to begin their design.



## Steward Vision and Goals:

Angi and Riley, the stewards, live at Emerald Acres with their dogs and both have taken their PDC. They love permaculture, connection with their land, the idea of growing their own food, and sharing all of this with their community.

This is from their vision and values statement:

Where do you want to be 1 year from now, 3 years from now, 5 or 10?

- 1 year: Bees, Chickens, Food Forest with Fruit Trees and Bushes, Annual Garden, Compost Station, Rainwater Storage, Improve Firepit area, Ceremonial Space
- 3 years: Pavilion for Gathering Space, Tiny Houses/Bunk Houses for Rentals, Outdoor Shower(s), Composting Toilet(s), Fruit Tree Nursery, Greenhouse
- 5-10 years: Retreat/Healing Center Space to share with others, Additional Land Acquisition, Well-established Permaculture Farm

Goals:

Short term (in the next year) - food security, sovereignty and freedom

- They will grow food for themselves and the community in kitchen gardens (unspecified), medicinal/pollinator gardens, food forests, foraging gardens.
- Establish bee hives (they have the hives, queens arriving April 12)
- Bat roost near the house
- Chickens near the house (not in the design area)

Mid term (in the next 1-3 years) - ceremony

- Wants walking trails for themselves and to share with guests for contemplation and meditation
- Would like a community pavilion and 2 tiny houses

- Wants a small, natural play and learning area for homeschool groups and guest's children
- Composting toilet near the tiny houses for guests
- Tee pee ceremonial space, cacao ceremonies, yoga
- Outdoor kitchen for gatherings and fermentation education

Long term (in the next 3-7 years) - nursery

- Shed for tool storage
- Greenhouse for nursery seed starts and overwintering

## **Design Team Goals:**

- Create an efficient and thorough process for future FFA2's.
- Create an efficient and productive team workflow that also builds community (people care) within our team while providing the steward with an incredible design.
- Create a model for other unique FFA2 properties to follow 3 ethics.
- Improve our skills in each of the areas we were assigned.

## **Client Interview**

The [first client interview](#) took place on zoom with Lindsay and the team watched the interview.

The second interview took place on zoom with the design team (Graham, Cynthia, and myself) to go over questions we had from the first interview, the site visit, and the water plan. In that interview we learned they had planted recently 12 fruit trees in the food forest ([measurements](#)).

A final interview on zoom was held to confirm everything was included and goals were met. These interviews, along with the site visit, gave us invaluable information to provide a design that included the elements they envisioned.

## Functions and Elements

### Water Management

<b>Functions</b>	<b>Elements</b>
Swales	Earth moving equipment, rocks, tree trunks
Small Ponds	Earth moving equipment
Berms	Earth moving equipment, rocks, tree trunks
Rain Gardens	Shovels, rain garden plants

### Short Term Goals

<b>Functions</b>	<b>Elements</b>
They will grow food for themselves and the community in kitchen gardens, medicinal/pollinator gardens, food forests, foraging gardens.	Water management (swales and rain gardens), specific plants/trees (chosen based on planting region, climate, choice, deer resistance), benches, lumber for raised beds.
Bee Hives	Already ordered, not part of the design
Bat Roosts	Lumber for bat house row (pictures included-not part of the design)

Chickens	Not part of the design area
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### Mid Term Goals

<b>Functions</b>	<b>Elements</b>
Wants walking trails for themselves and to share with guests for contemplation and meditation	Earth moving equipment, gravel or other choice of path material, logs to line paths, benches to dot path
Would like a community pavilion and 2 tiny houses	Lumber for pavilion, earth moving equipment to level area, tiny houses already chosen
Wants a small, natural play and learning area for homeschool groups and guest's children	Lumber for raised beds and play equipment, repurposed materials already onsite, rocks, tree stumps, benches, sensory and aromatic plants
Composting toilet near the tiny houses for guests	Already chosen
Tee pee ceremonial space, cacao ceremonies, yoga	Tee pee on site, earth moving equipment needed to create a pond to manage water flow in the area and to clear space for outside ceremonies (recommendations made verbally, this area is not in design area)
Outdoor kitchen for gatherings and fermentation education	Part of community pavilion

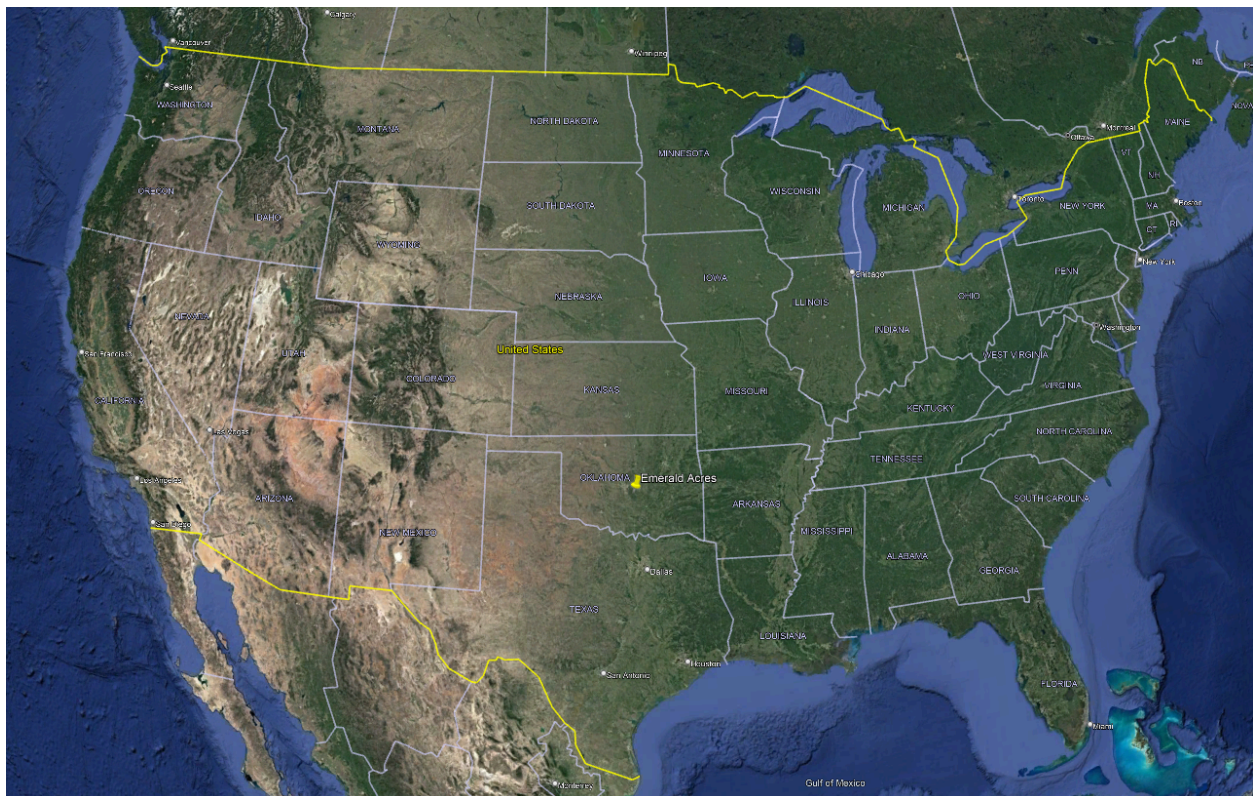


## Long Term Goals

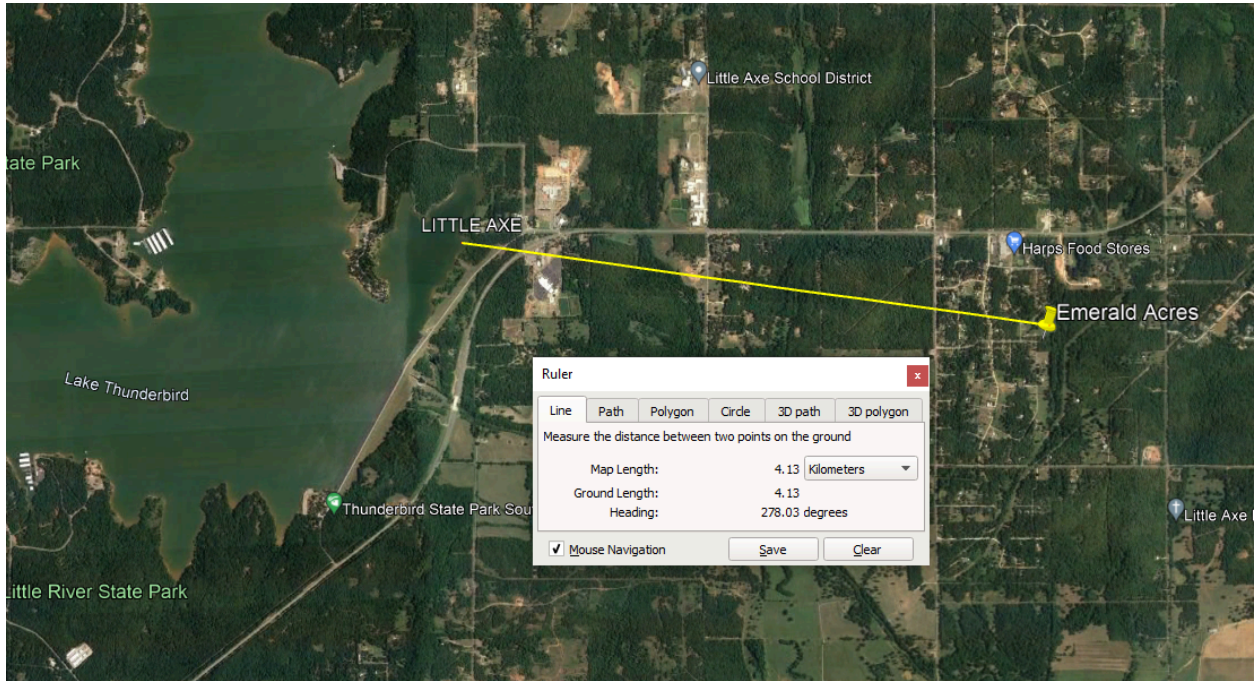
Functions	Elements
Shed for tool storage	Already chosen, placement needed on design
Greenhouse for nursery seed starts and overwintering	Earth moving equipment to level area as well as tree farm space, greenhouse already chosen

## Location

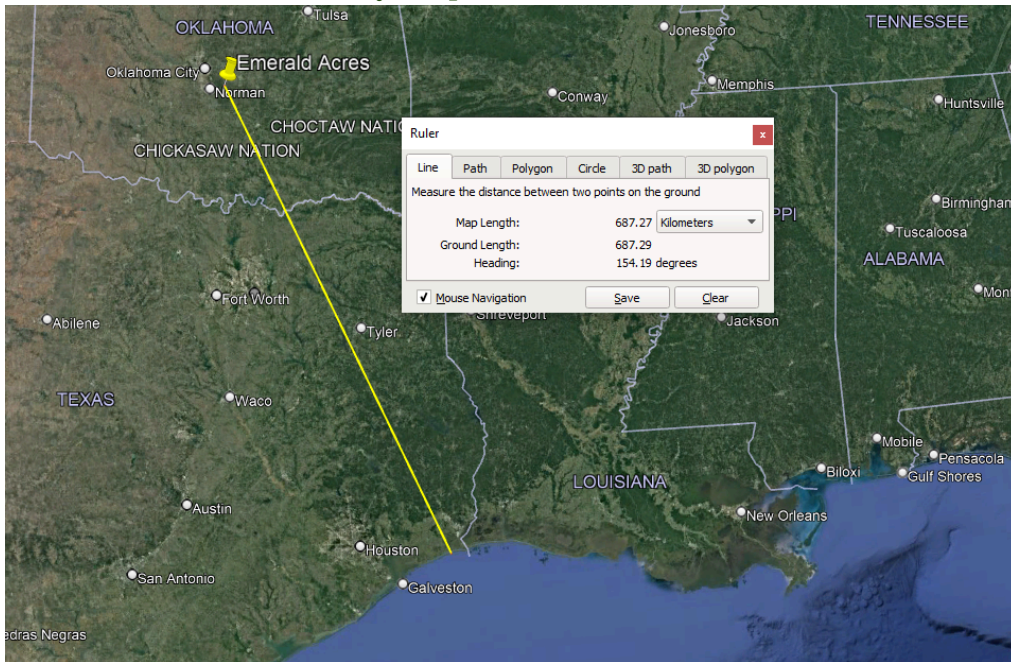
Emerald Acres is in the south central United States.



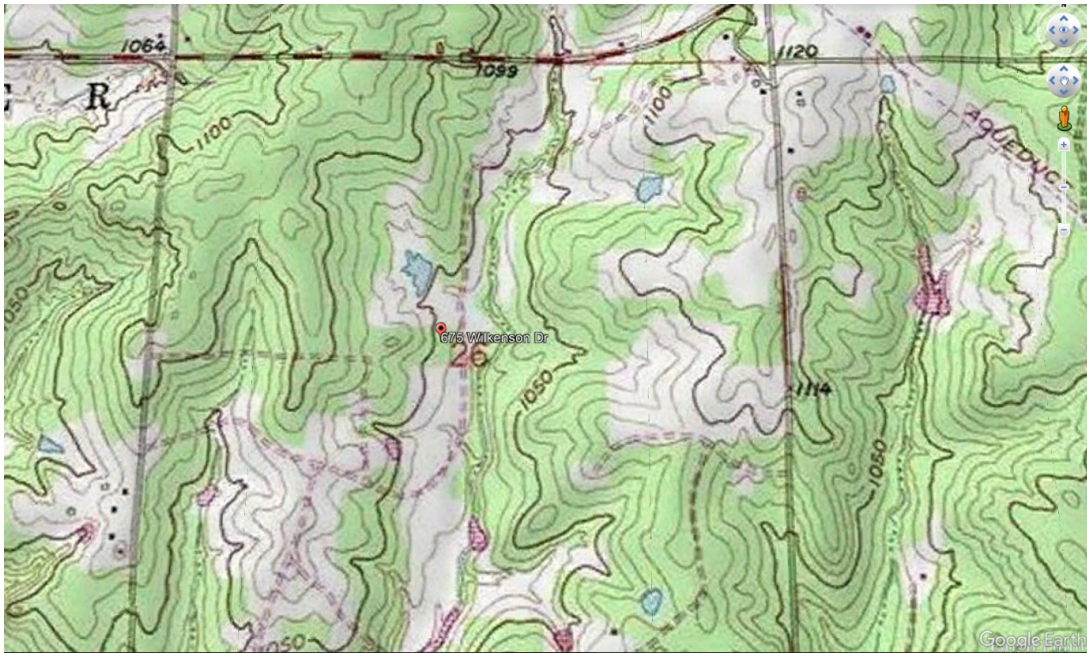
The property is about 4.13 kilometers or 2.5 miles from Lake Thunderbird.



And about 687 kilometers or 427 miles from the Gulf of Mexico. Effects from hurricanes would rarely impact this site.



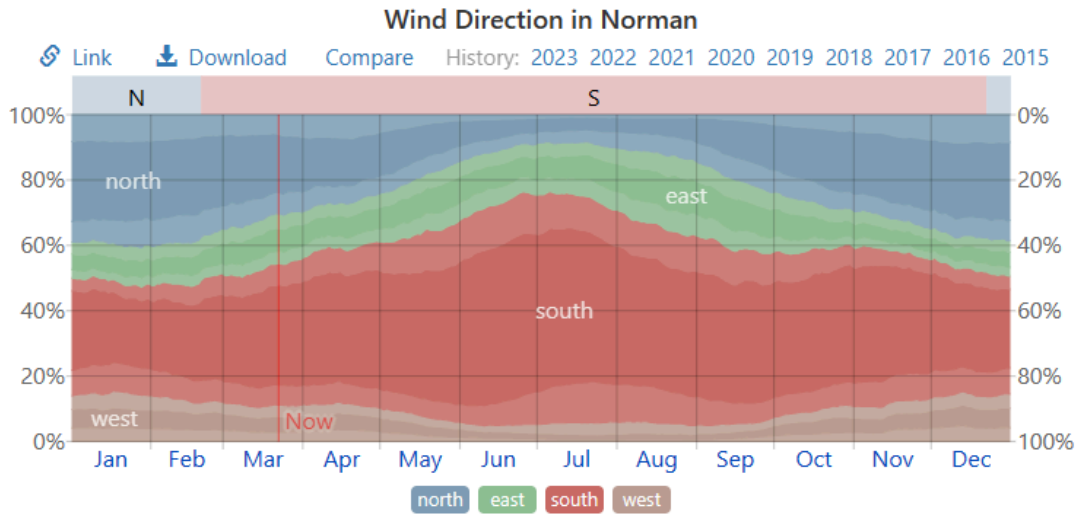
There is a 20 foot (6 meter) elevation change from the main road to the creek.



## Climate

Prevailing Winds:

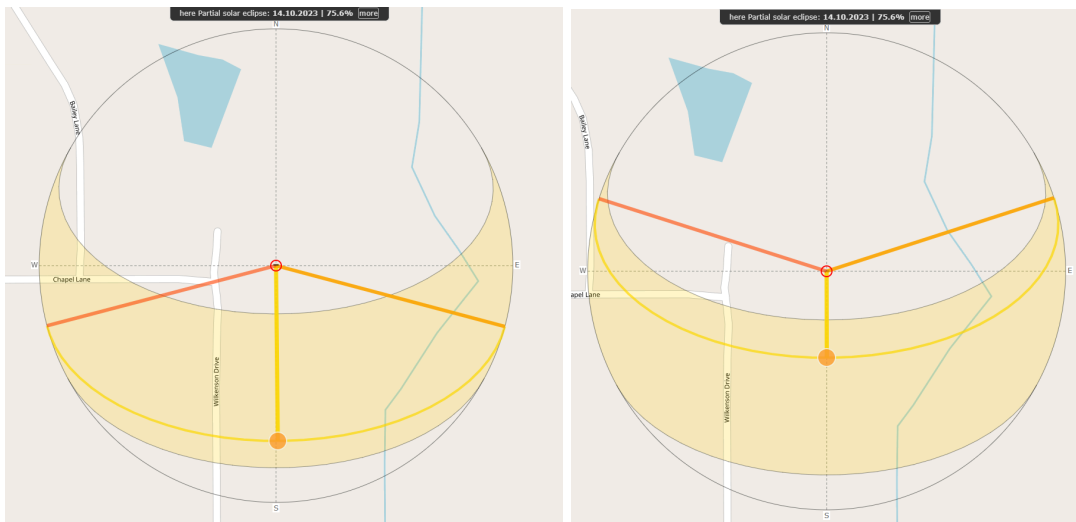
Winds are from the north in Dec-Jan, and south in Mar-Nov.



*The percentage of hours in which the mean wind direction is from each of the four cardinal wind directions, excluding hours in which the mean wind speed is less than 1.0 mph. The lightly tinted areas at the boundaries are the percentage of hours spent in the implied intermediate directions (northeast, southeast, southwest, and northwest).*

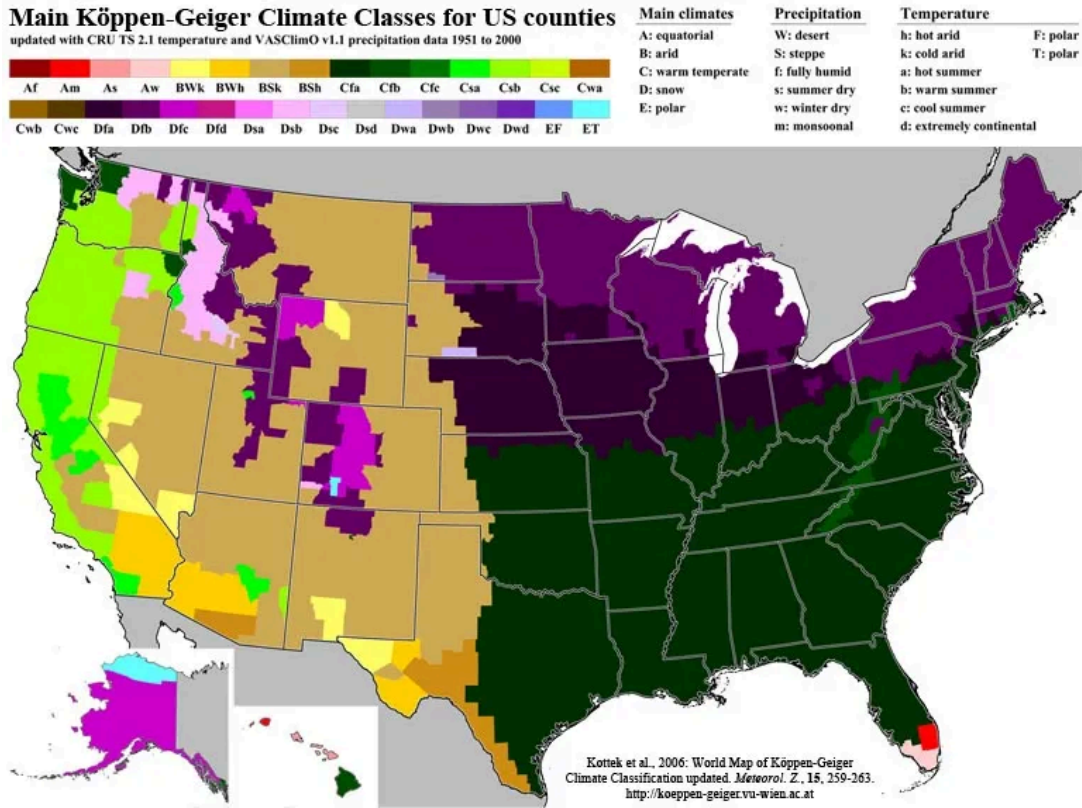
## Sun Angles:

Winter Solstice, December 21, 2022 and Summer Solstice, June 21, 2023

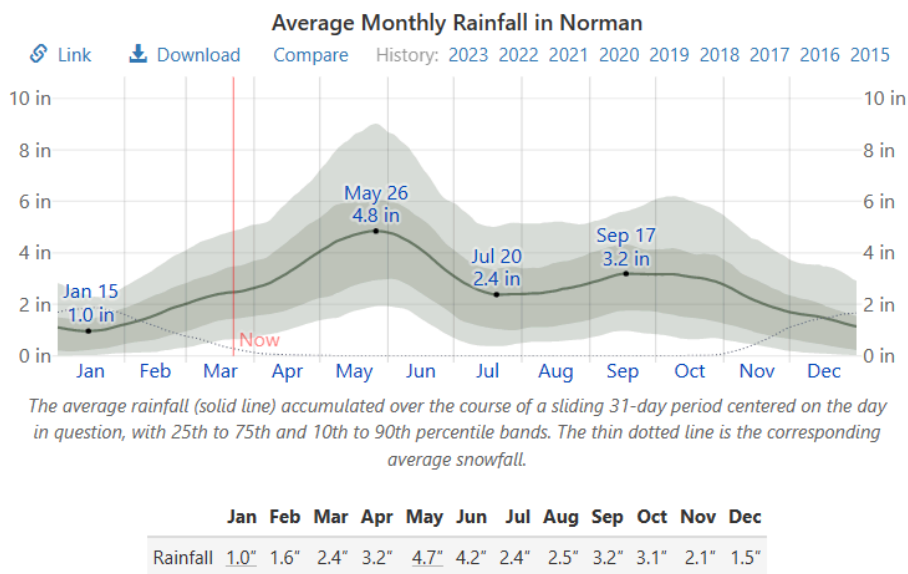


# US Plant Hardiness Zone: 7a

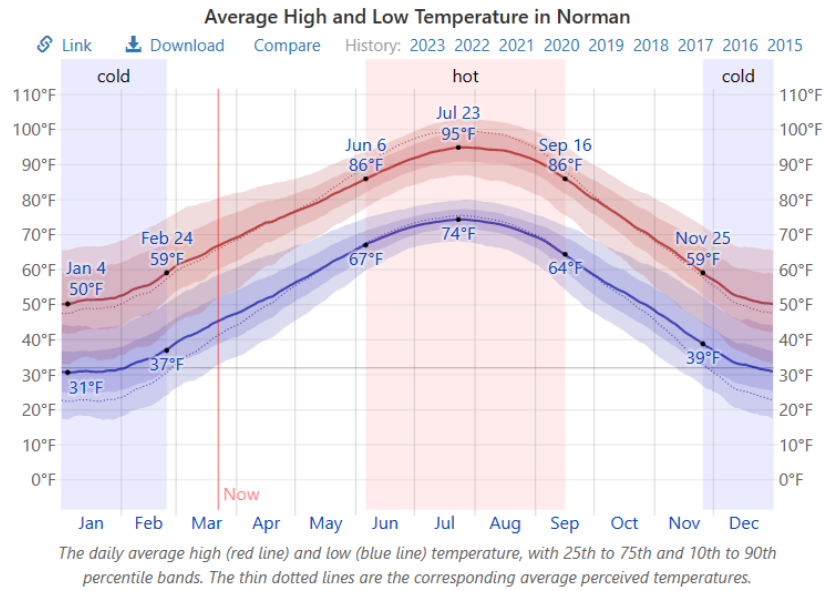
# Koppen Climate Classification: Cfa Humid Subtropical



## Annual Rainfall:

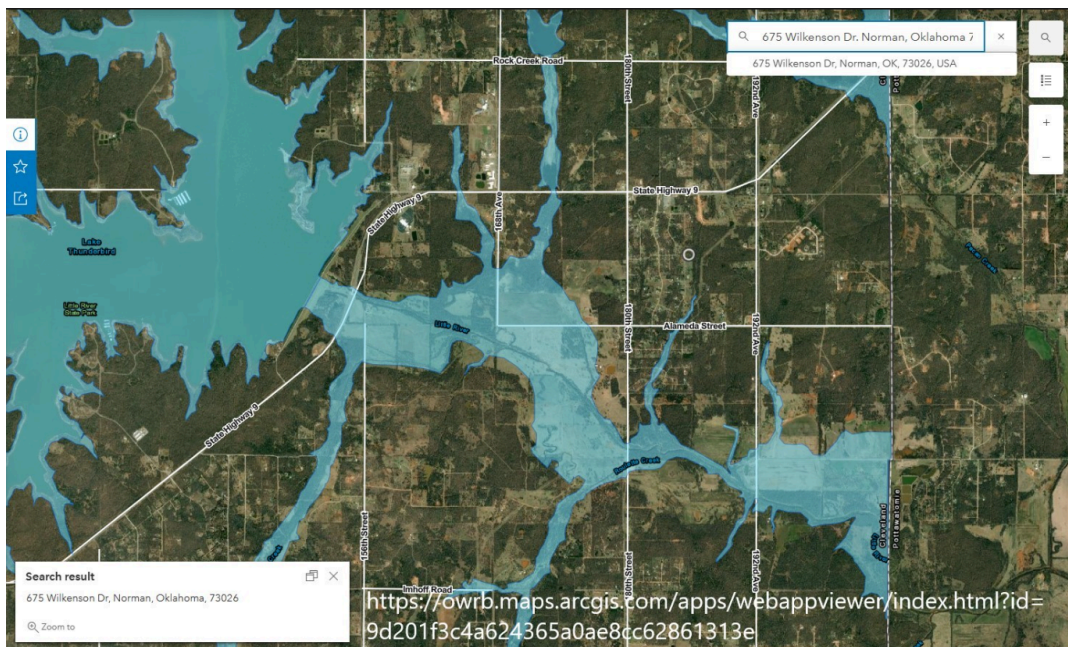


# Annual Temperatures



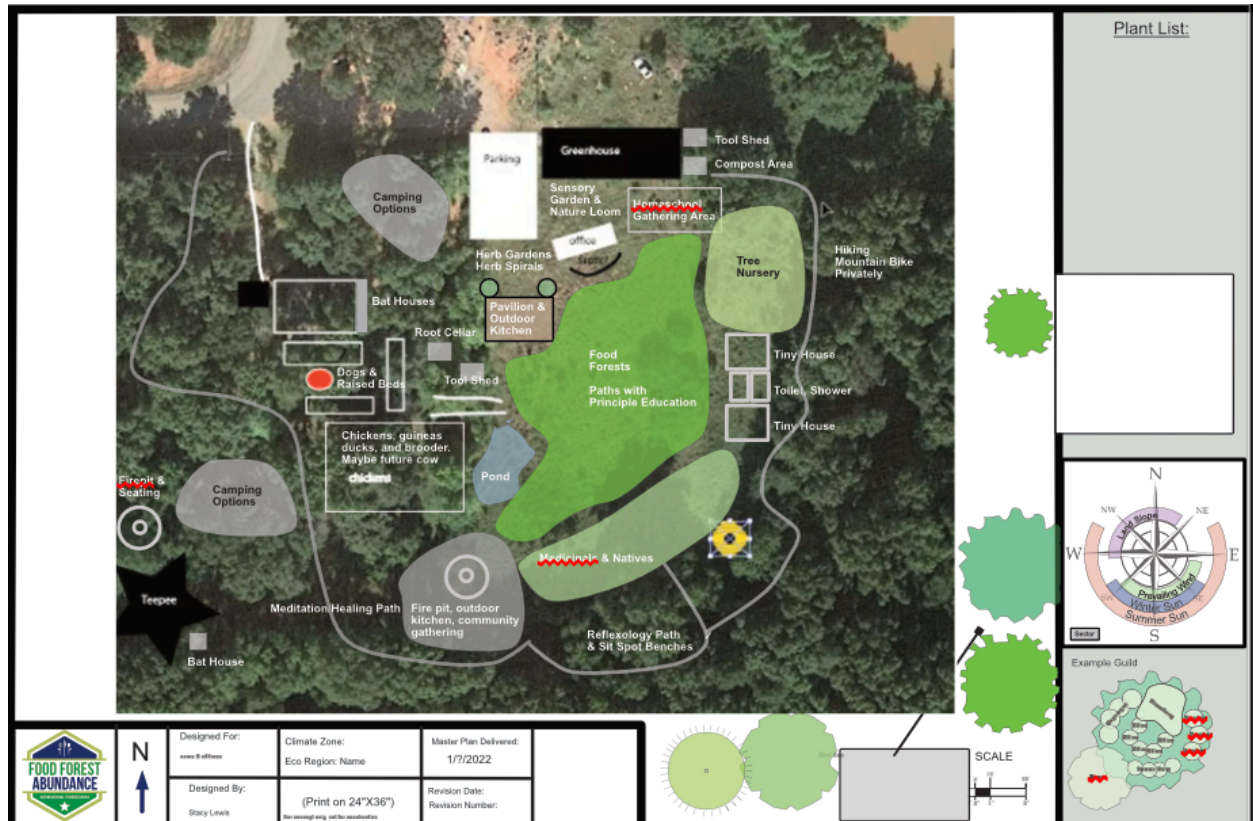
Average	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec
High	51°F	56°F	65°F	73°F	81°F	89°F	94°F	93°F	86°F	74°F	63°F	52°F
Temp.	40°F	44°F	53°F	62°F	70°F	79°F	84°F	83°F	74°F	63°F	51°F	41°F
Low	31°F	35°F	44°F	52°F	61°F	70°F	74°F	72°F	64°F	53°F	42°F	33°F

## Flood Plain Map:



# Site Visit

Cynthia traveled to Emerald Acres in early April for the site visit using my [questions and ideas](#).



Rough Draft Concept Design

Deep connections were made with the stewards and with the land on the site visit, and time was spent hiking the land to observe the water flow, deer trails, and the food forest location. Cynthia's pictures and videos helped the team observe and interact with the property in our own way.



The moss that carpets the whole property, especially the wide trail at the bottom, or east, of the property. We refer to that as Emerald Acres Avenue.