Lychee tree recovery post severe pruning

Currently, severe pruning of lychee trees is part of the Lychee Erinose mite eradication protocol implemented by the Florida Department of Agriculture and Consumer Services (FDACS). This pruning results in a pronounced regrowth of new shoots and leaves as the tree re-establishes a balance among the mass of the root system and the canopy of the tree. The post-pruning care recommendations are:

**Watering – irrigation**
1. Stop watering the tree immediately after the canopy is removed. Remember, trees only lose water through their leaves (no leaves, no water loss) and so, if trees are watered too much when they have little to no canopy, this results in too much soil moisture and the tree may decline from low soil oxygen content and/or fungi may attack the root system.
2. Once the tree begins to regrow i.e., new shoots start to emerge – begin watering, one good soaking a week should suffice.
3. Once these new shoots are more than a foot or so in length, water one to two times a week. If it rains a quarter inch or more skip the watering.

**Fertilizer – nutrients**
1. Do not apply fertilizer to the soil immediately after the canopy is removed. Trees cannot take up nutrients unless they have leaves.
2. Once the tree begins to regrow i.e., new shoots start to emerge – the amount of conventional and/or organic fertilizer to apply will depend upon the size of the tree. The general rule for conventional fertilizers is small amounts of granular fertilizer once a month is better than a large amount at one time infrequently. Be sure to spread it from the trunk out to the old dripline so most of the root system is fertilized. Alternatively, a slow-release material (follow label instructions for rates and frequency) may be used which would supply small amounts of nutrients over time as it degrades. If liquid fertilizer is used, then small amounts once a month should be enough – the idea is to apply a drench from the old dripline to the trunk area to cover most of the root system.
3. As the tree continues to re-establish canopy and has branches 4, 5 or more ft long, and there is a lot of foliage, reduce or eliminate nitrogen fertilizer applications to enhance the chances the tree will bloom and set fruit in the spring. Trees over fertilized with nitrogen generally remain vegetative and do not flower and fruit. Apply potassium once during the fall and again in early spring. The secondary (magnesium) and micronutrients (manganese, zinc, iron etc.) may be applied to the foliage in a spray solution or to the ground in granular or spray solution. This should be done two to three times from about March through October.
Pruning

1. There is an opportunity to maintain the new lower tree canopy after being cut back dramatically. Tipping off the ends of the new shoots when they are 2-3 ft long will cause them to branch. This will create more shoots with a potential to flower and fruit.

2. Lychee trees in a *grove setting* should be pruned to force more lateral growth and branching and should be maintained no taller than two-thirds the distance among rows. For example, if rows are 25 ft apart, trees should be kept at 16-17 ft height or less in order to maintain the fruit production in the lower canopy, along the sides of the tree.

3. Lychee trees in *the home landscape* should be maintained at 10 to 15 ft in height. This will maintain the lower canopy and fruit production in the lower canopy and make caring for the tree and harvest easier, more efficient and safer.

(u://ext/handouts/2020/lychee TREE recovery post severe pruning 2020 v3.doc and in lychee fact sheet folder)