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Thanks for your business and interest in Aloe polyphylla. Here is a brief set of instructions and caveats to start your journey of wonderment growing the Spiral Aloe.

**Soil Mix: Use any common potting soil. Do not use Coir fiber or Peat. They have too high a water holding capacity and suck water out of the roots when moisture fall as recommended. Suggested volume ratios of rock to potting soil are 1:1. The term ‘rock’ means 5/16” grade red lava, perlite or pumice.** This media formulae is closer to what is used in hydroponic grow systems than any media specification you’ve seen.

Prevent the soil temp. above 80F by using a large container, ceramic, wood or terra cotta. Dry granular organic materials fertilizers are NOT safe. The added microorganisms are facultative, meaning they can act as both pathogen or only saprophytic benign behavior.

You may safely use *Bacillus subtilis* and/or *Streptomyces lydicus*. NO Osmocote, No salty granular formulations. I use Miracle-Gro at 1 tbspn/gal only. No Dr. Earth preparations should be used, they outgas ammonia which kills roots.

Be watchful of ant activity and use chemical warfare to kill and deter them and aphids and mealy bugs by using 1% soap with some pyrethroid additive. Mites have proven to be a major threat.

Never pull off leaf with tip necrosis mid spiral. The only grooming is to pull off the lowermost leaf when paper thin. The plant will release its hold on it when the goo is resorbed. At maximum size of ~175 leaf the dynamic ratio of new leaf creation to old leaf retirement is 1. *Fusarium* infection of roots alters this ratio to less than 1, and mites in the root stump do the same.

Healthy roots are yellow, dead roots are brown. Some live older roots will have a brown color due to suberization. If the plant collapses pull it up, clean off the dead roots, jet wash, scrape the root stump with a penknife down to hard tissue, removing all dead tissue. Let the plant dry before replanting on moist soil in shade. In 2-3 weeks, new roots form. I call this plant rehabilitation and is a normal and expected event in the life of A.p.. Adult container specimens require this every 5 years. Do not water the plant until a “push/pull test” proves that new roots have formed to grab the media, creating resistance to push or pull. Healthy roots require much oxygen to inflate each leaf. High soil temperatures and/or flooded soil will suffocate the roots.

The above recommendations are written referenced to container plants, in the landscape a mound of sandy loam free of root competition from other plants will be a good start for 65-75 leaf plants and diminish concerns of high soil temps.

I warranty each plant for 60 days after shipment. If you follow instructions and your plant suddenly dies I will send another only if you provide a pic of the plant via Email. Upon receipt, expose the plant to air and light, there is no immediate requirement to install in the specified media. Prepare the media and water it. Place your plant high in the center of container and wait several weeks for new roots to form. You may apply liquid fertilizers at this time. Your plant may have been treated with systemic insecticides and miticides to protect it against the Springtails (Collembola) and the Eriophyid mites which can inhabit the root stump. The Springtails are easy to eliminate, but the red mites are very small and cause a very big problem for A.p. The mite adults are visible with a handlens, but the larvae measure in at about 250 microns, making them invisible to even those with handlens. They occupy the live/dead tissue boundary in the root stump. The mites infested plant will die slowly from symptoms which mimic death by Fusarium. After 3 decades of dealing with this I'm convinced that the major pest of A.p. is actually the red spider mites, and not Fusarium, which is now listed in second place. Most other Aloes in Southern Calif can be plagued by subcutaneous mites which generate a hyperplasia (tumor) easily viewed. There is **NO CURE**. Prevention is then the only strategy.

Abamectin is one miticide but is not systemic. Spirotetramat is a systemic miticide. The use of essential oils such as garlic clove, rosemary, and castor (Mite-X) has value in surface treating the root stump by soaking for plants undergoing a rehabilitation procedure. The Orange-guard product has limonene which is also good. For A.p. infected with red mites there is a stasis reached where they simply stay put in the root stump. They cannot live outside of the root stump, like termites, are very vulnerable to desiccation and UV light. Plants so infected may begin to lean to one side and have an altered dynamic leaf ratio, losing more leaf than are being grown. This is all you will witness unless the mites are disturbed by carving back dead tissue of the root stump to reveal the live/dead tissue boundary. I cannot report any success to spray or soak mite infested plants with any miticide.

I receive many questions regarding tip necrosis. This is the effect of a limited soil volume, insects or the Fusarium fungus. If the symptom occurs only on the oldest leaf, then this is considered a symptom of pre-retirement of the leaf, but if this occurs in mid-spiral with larger lesions then I would recommend pulling up your plant and inspecting closely for insects etc....clean dead tissue, jet-wash and re-root. The root stump should be hard. If soft, cut away all soft tissue, spray with an aerosol insecticide and re-root.