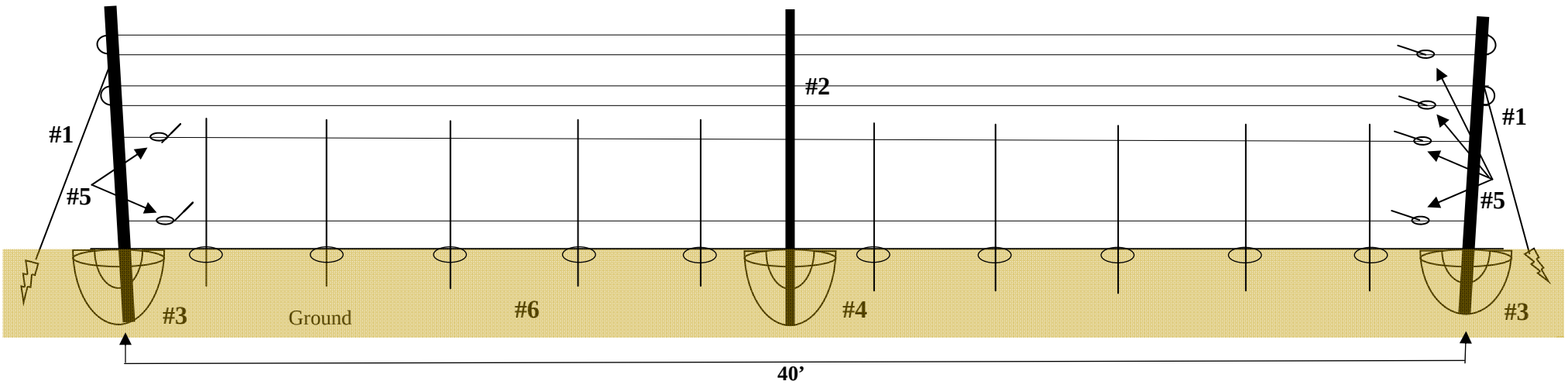

Constructing the standard 40’, 10-vine vineyard trellis:

Step One: Mark out the trellis row by measuring the desired length of the row. A standard home vineyard row, as depicted above, is 40 feet long from EndPost (#1) to EndPost (#1). There is typically one MidPost (#2) for every five vines, as depicted above. Mark the end points where the holes for the EndPosts (#1) will be dug. Then mark the mid-point between the two EndPost locations where the hole for the MidPost (#2) will be dug. Use two stakes and a string to ensure a straight line between your two EndPost points.

Step Two: Dig your EndPost holes (#3) from 1.5 to 2 feet deep, with 2 feet deep being optimal, and approximately 2 feet wide. Dig your MidPost hole (#4) at an approximate 1.5 feet depth and it need be only a foot or so wide. Set the two EndPosts (#1) in their holes (#3) and poor in dry Quikcrete quick-set concrete (red 50lb bag), securing the End-Posts at a 5-10 degree angle. It is important that the EndPosts be slightly slanted out from the vines in order to strengthen your trellis. Add water to the quick set concrete, total-lay submersing the powder, no need to mix. Set the Midpost (#2) straight-up into its hole and add the quick-set concrete. Add water, no need to mix. Ensure the MidPost is plumb. Allow the quick-set concrete to set up for at least a couple hours before proceeding to Step 3 and beyond.

Step Three: Mark each EndPost at the height that each of your trellis wires will be strung. From the ground, measure 6 inches up the outside of each EndPost, and mark a short lateral line using a sharp instrument or a Sharpie marker. This will mark the height of your Irrigation Wire. Hammer in a U-shaped fence nail that straddles and is perpendicular to the marked line. Only hammer them in half way, as these fence nails will serve as a guide for your wires as they are strung around the end posts. Next, measure another 30 inches from the Irrigation Wire line up the outside of the post and mark a short lateral line. This marks the height of your Middle (Cordon) Wire. Install a U-shaped fence nail as before. Next, measure up the outside of the post another 12 inches from the Cordon Wire and mark a short lateral line. This marks the height of your initial Catch Loop Wire that will help train your fruiting shoots. Install a U-shaped fence nail as before. Next, measure another 12 inches from the initial Catch Loop wire and mark a short lateral line. This marks the height of your top Catch Loop Wire toward and beyond which your fruiting shoots will be trained. Install a U-shaped fence nail as before. DO NOT YET RUN WIRES.

Step Four: Drive a Duckbill Earth Anchor into the ground two feet outside the base of each EndPost and centered with the EndPost. Position the Duckbill atop the ground at a forty-five degree angle, with the pointed side of the Duckbill pointing away from the EndPost. Use the steel driving rod and a hand sledge or jack hammer to drive the Duckbill at that angle into the ground, at a depth that leave the looped wire just a few inches above the ground. Next, hammer a U-shaped fence nail on the inside of the EndPost approxi-mately 4 inches lower than the top Catch Loop Wire mark. Cut an approximate 8-foot piece of trellis wire and run one end of the wire through the fence nail on the EndPost and the other end of the wire through the wire loop of the Duckbill. Attach the two wire ends using a Gripple, and tighten.

Step Five: Run your bottom Irrigation Wire from one EndPost, past the MidPost, to the other EndPost, looping the wire end around each post, through the U-shaped fence nail wire guide and connecting the wire to itself with a Gripple (#5) approximately 8 to 10 inches from the inside of the post (do not install the Gripples too close to the post...there must be sufficient space between the Gripple and the post for tightening the wire). Tighten the wire using the Grippler Tool just enough to make it taught. DO NOT OVER-TIGHTEN.

Step Six: Run your middle Cordon Wire from one EndPost to the other (ensuring that this wire is on the same side of the MidPost as the bottom Irrigation Wire) and loop the wire end around each post, passing it through the U-shaped fence nail wire guide, and connecting the wire to itself with a Gripple (#5) approximately 8 to 10 inches from the in-side of the post (do not install the Gripples too close to the post...there must be sufficient space between the Gripple and the post for tightening the wire). Tighten the wire using the Grippler Tool just enough to make it taught. DO NOT OVERTIGHTEN.

Step Seven: Next, run your initial Catch Loop Wire from one EndPost to the other, threading the wire through the second EndPosts wire guide, taking it back past the MidPost to the other EndPost, and passing it through that EndPost’s wire guide. Be sure the looped wires are on each side of the MidPost! Cut the wire, leaving enough extra wire for join-ing the two wire ends with a gripple approximately one foot from the EndPost. You now have a looped, or double, wire for training your fruiting shoots that will emerge from the vine arms that will be trained along the Cordon wire.

Step Eight: Install the top Catch Loop Wire as directed in Step Seven. When finished running all the wires, tighten them with the Grippler tool. Next, on the MidPost, use U-shaped fence nails to serve as wire guides where the wires touch the MidPost. Be sure to only pound the U-nails in half way so as not to crimp or damage the wire. Throughout the life of your trellis system, you will want to check for “popped/loose/missing” U-nails. Re-install these nails as necessary.

Step Nine: Starting from the inside of one EndPost, you mark will mark out the spots where the 1”x1”x5” grapestakes (#6) will be installed, five on each side of the MidPost (#2). Your first mark will be at 2’ from the inside of one EndPost; the next will be at 4’; the third at 4’; the fourth at 4’ and the fifth at 4’ (which will be two feet from the Mid-Post). Starting from the MidPost, mark your next stake location at 2’; the second at 4’; the third at 4’; the fourth at 4’ and the fifth at 4’ (which will be two feet from the End-Post).

Step Ten: At each grapestake location, place the 1”x1”x5’ grapestake against the inside of the Irrigation and Cordon wires, ensuring they are straight up and down, and pound the grapestake into the ground at least a few inches, more if possible. Once the stakes are installed and straight, use 8” wire ties to affix the Irrigation and Cordon wires to each stake.

Step Eleven : Run the 1/2” drip line along the bottom wire and affix to the wire with Drip Line Clips. Close one end of the drip line and hookup the other end of your irrigation line to your irrigation system. Using a dripper hole punch, make a hole approx. 2” to the left of each grapestake at the bottom of the drip line. Locate your drippers to the right or the left of the vines for uniformity. Then install 2gph vineyard-quality drippers. At the front of each grapestake, dig a vine hole approximately 6” wide by 6” deep. Plant each vine with the vine trunk leaning toward the grapestake. After planting, form a packed crown of dirt around the base of each vine to prevent water from washing away, and to help funnel the water down the base of the vine. Install vine tube shelters by carefully placing the tubes over each plant and stapling the top of each tube to the grapestake. Ensure that the base of each tube is flush with the ground.

Step Twelve: Finish your trellis system by trimming your grapestakes to just a few inches above the cordon wire. Use a heavy duty lopper tool to do this. Finally, if desired, trim your End & Mid Posts to just a few inches above the top Catch Loop Wire using a chain saw or a Sawzall tool.

Don’t hesitate to contact me with questions! (cell) 909-560-7834 (text) 213-276-4467 Email: VineWhisperer@aol.com

Vineyard Supplies Needed (and cost per piece):

2	5.25”x8’ Treated Wood EndPosts	($18ea)
1	3”/4”x8’ Treated Wood MidPost	($12ea)
10	1”x1”x5’ Treated Wood Grapestakes	($ 1ea)
2	Duckbill Medium Earth Anchors	($10ea)
1	Duckbill Drive stake	($ 8ea)
300’	of 12.5 gauge galvanized vineyard wire	($.04/ft)
8	Medium Gripples	($1.35ea)
1	Grippler Tool	($90ea)
3	Quikrete quick-set concrete, 50lb bag (red)	($5.25ea)
20	8” galvanized wire ties	($.04ea)
50’	1/2” Drip Line	($.09/ft)
10	2gph Vineyard-class Button Drippers	($.50ea)
40	1/2” drip line clips	($.06ea)
16	Barbed U-shaped Fence Nails	($30/box)
	Premium Grafted 2yr old vines	($8ea)