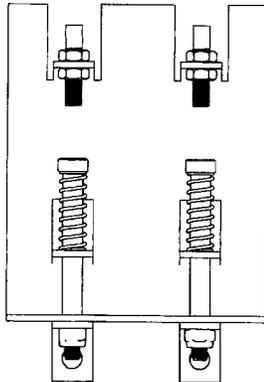


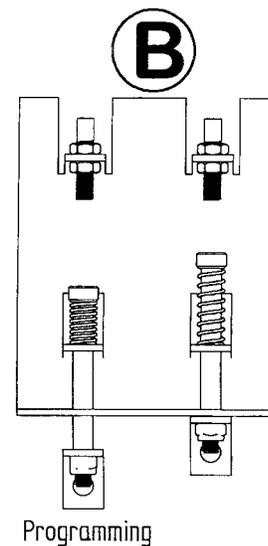
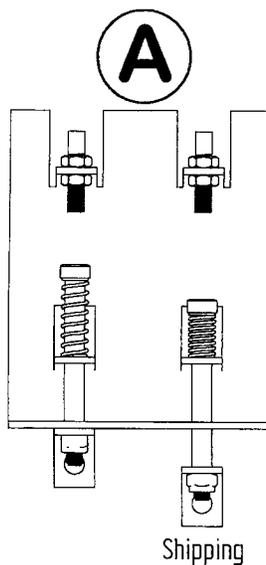
BOOMERANG STARTUP GUIDE

STANDARD WATERING

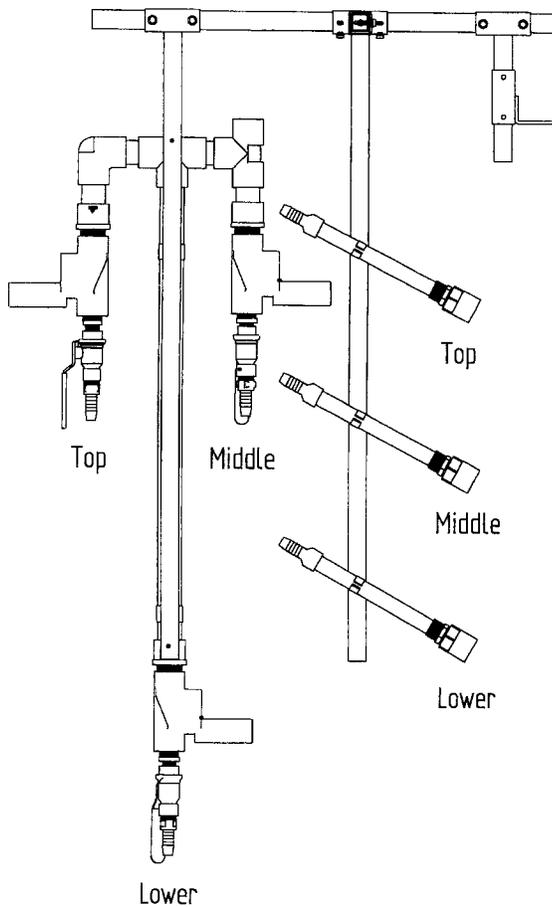


From the Boomerang startup there are 2 options: Shipping & Programming mode. Shipping mode simply moves the baskets along with no watering capability. In this mode you can adjust the speed or how fast a basket travels. Programming mode allows you to move the baskets along while they are being watered simultaneously. The length of time a basket is watered as well the speed of the basket are also adjustable in this mode. Depending on how many basket layers your system has you are also given the option of watering just individual or multiple layers during the programming phase.

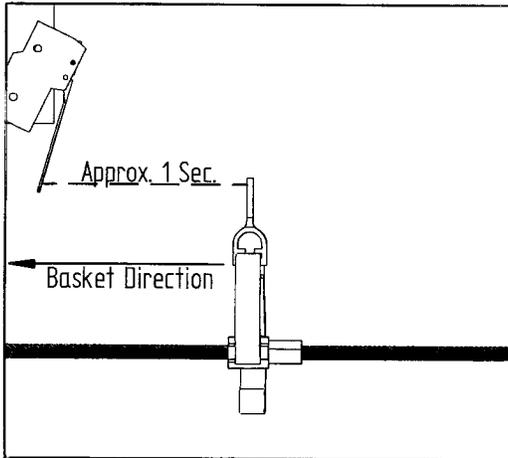
To begin you must first identify which is your "Programming" and "Shipping" pull cord (if you have not already identified them). Starting from the powerup of the Boomerang begin by pulling one cord at a time. If the system begins to move immediately you have identified the "Shipping" cord (A). Mark that cord "Shipping" for later reference. If the system does not move and your electric water valves begin to make a 'clicking' sound, you have identified the "Programming" cord (B). (If your water mains have been connected you may also notice water flow from the watering heads at that time). Mark that cord "Programming" for later reference.



After identifying your pull cords you may now begin operating the Boomerang. To begin a normal watering cycle pull the "Programming" cord once (A). If you have connected your water your water mains you should see water flowing from your nozzle heads. If your mains have not been connected you should be able to hear a 'clicking' sound inside each valve indicating they are functional.

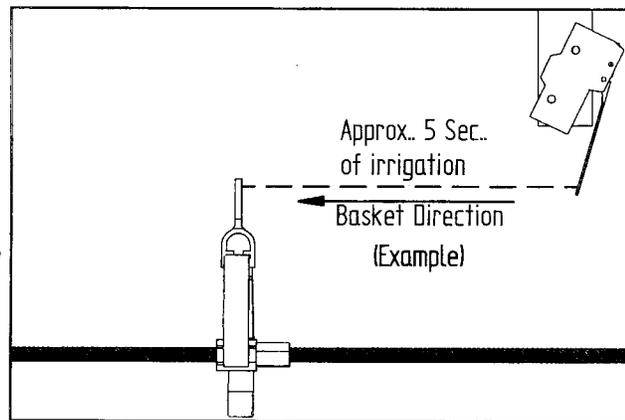


In this stage each valve and /or watering head represents a basket layer on your Boomerang. Water flow or a valve 'clicking' indicates that that layer will be watered in the next cycle. No water flow or 'clicking' means it will not be watered. To select which layer you want irrigated pull the "Shipping" cord once to cycle between different valve combinations. (NOTE: This does not apply to Boomerangs with only 1 Layer. For a single layer simply pull the "Programming" cord twice to start the watering cycle). Once you have selected your valve combination pull the "Programming" cord once. This should begin your watering cycle and water each basket until 1 basket has made a full revolution around the Boomerang. Even after the Boomerang has begun a watering cycle it is still possible to make changes as it is moving such as watering duration and the travelling basket speed.



A.

To adjust the watering duration of your baskets watch as the basket hooks 'click by the OMRON snap switch. As the next basket approaches the OMRON switch wait before the basket hook makes contact with the switch and pull and hold the "Programming" cord(A). As the basket 'clicks' past the OMRON switch the water valve should open and begin to water. The number of seconds you want the basket to be watered starts from the moment the valve opens. Count off the seconds you need and release the "Programming" cord(B). Until you make another adjustment all future baskets will be watered for the same amount of time. NOTE: if you change the speed of the basket after you have set the watering time you will need to readjust the watering duration.



B.

To adjust the basket travel speed while the Boomerang is moving wait for a period when the OMRON switches are not engaged and the valves are off (a quiet period 'C'). Pull the "Programming cord and hold it down until you see a noticeable difference in the basket's speed. Each time you pull the "Programming" cord you will be either cycling through either an acceleration or deceleration of the basket. To alternate between modes simply pull the cord again.

