



SKYSPAN SHADE
COMMERCIAL UMBRELLAS AND SHADE STRUCTURES



VISTA - with Electrical Cable
for Lights

Cantilevered Umbrella

Method Statement

Installation

Components

1 x Main column	1 x Hex drive positioning tool and pivoting lever
1 x Boom arm	1 x Jack winding handle
1 x Jack assembly with canopy	6 x M12 S/S nyloc nuts & washers (head unit to angle boom arm top plate)
2 x 16mm x 45mm S/S bolts (Angle boom arm to column connection)	6 x Poly tube (stud protectors)
2 x 16mm S/S washers	1 x Foam arm spacer
1 x M24 x 50mm hex drive position locking bolt	1 x Umbrella securing strap

Required Tools

- | | |
|---|--|
| 1. Hold down bolt assembly (consisting of 6 x M16 @ 300mm threaded rod, 12 x M16 nuts and square washers and 6 dome nuts) | 7. White cleaning cloths |
| 2. Chemset 101 - 1 tube per 4 umbrellas with a nozzle per hole | 8. Bucket with PH Neutral chemical to wipe canopy down |
| 3. Spanners and sockets | 9. Silicone |
| 4. Torque wrench | 10. Grout (non shrink) |
| 5. Hammer drill | 11. Small vacuum or blower |
| 6. Step ladder (3mtr) & (2mtr) | 12. Spirit level |

Installation of this umbrella can be done with 2 people if using a Skyspan Cantilever installation Jack, 3 people if installing with no mechanical aids.

Electrical Installation

Electrical Cable

A qualified electrician should arrange the electrical cable to come up in the middle of the hold down bolts through a conduit pipe. This is completed before the concrete footing is poured.

- There will be one run of 2C&E 1.5mm cable per umbrella.

Lights

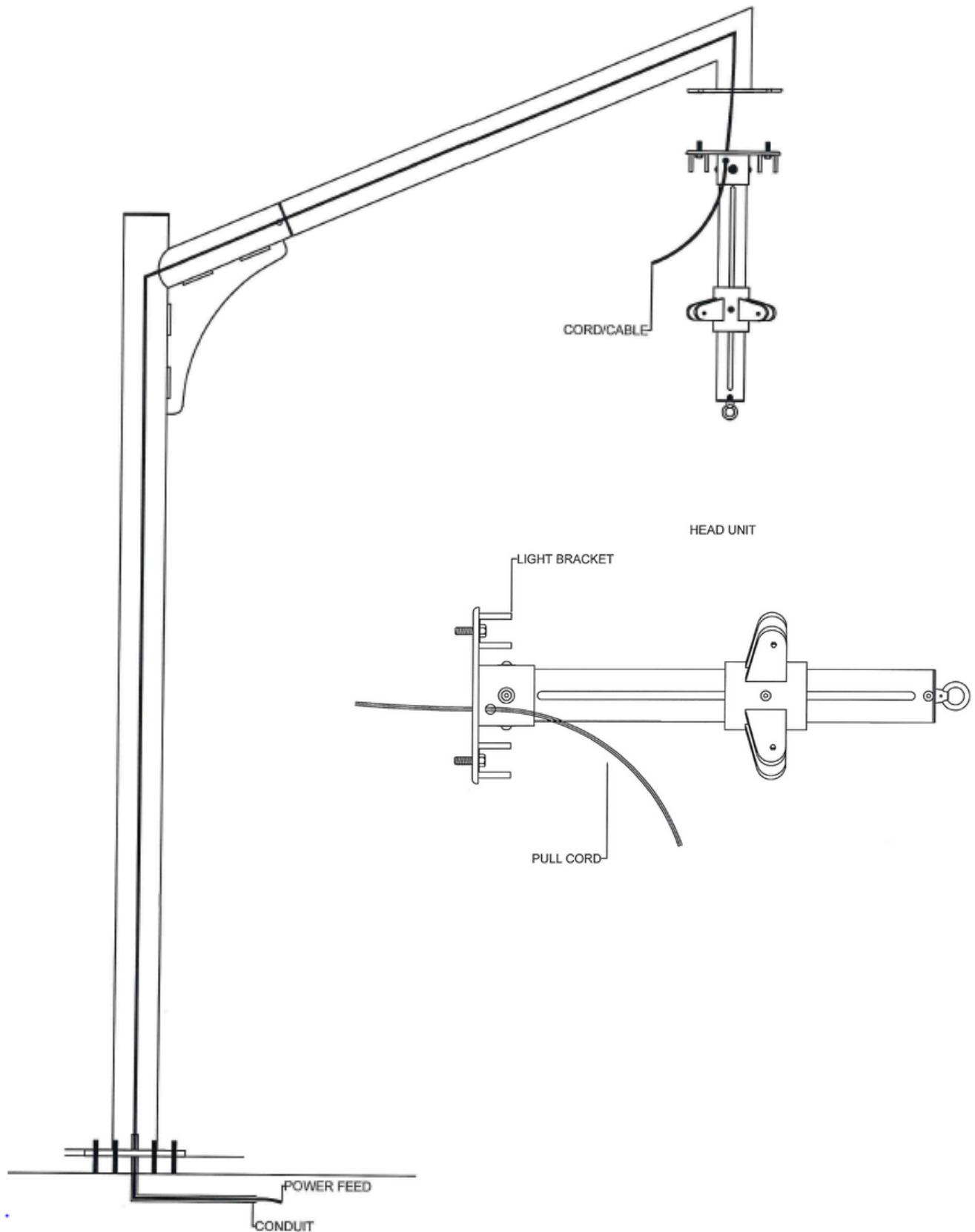
The factory installs light brackets when the head unit is assembled.

- There will be two 12V lights per umbrella.
- A cable will be run through the main column when a Vista includes lighting.
- We also put a pull string in the head unit, so that the cable can be tied and pulled through during the installation process.

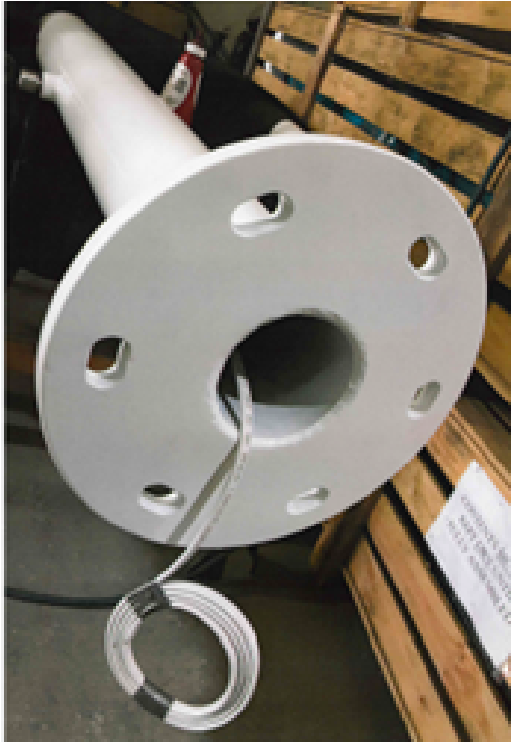
Electrical Access Panel

This is installed in case of any later electrical work.

Drawing of how cables can be fitted on the vista frame.



These two photos show the cable within the column pre-installed in the factory..



This shows an example of a conduit coming into the base from the side.



The cable then comes out of the top of the head unit, connecting to the lights. We attach the light brackets here when the head unit is assembled, and the electrician attaches the lights and wires them up during install.



Finally an access panel is provided, with the cables hanging out ready for connection.

Hold Down Bolts

1. Using the supplied template of the column base, place the template onto the installation surface in the desired orientation (keeping in mind of the direction of the stud pattern for desired orientation) and drill holes with an 18mm drill bit to a minimum of 225mm deep. Clean all dust completely from the hole using a hole brush and compressed air. Follow attached Chemset 101 Installation Guide method statement for installation of 6 x M16 hold down bolts.

NOTE: Use the template to line up the bolts as you go, once done leave bolts to set as per chemset label.

2. Wind on M16 levelling nuts/washers and set topside to be 45mm off the footing to allow for levelling and sufficient grout for structural integrity, Use the supplied thread protectors to slide over the hold down bolts to prevent any paint damage when the columns are seated on the levelling nuts. **(60mm is needed for fixing off the column, this is including the thickness of column base 1 x structural washer, 1 x structural nut, 1 x dome nut)**

Main Frame

Unpack crate. Check that all umbrella components (as per page 3) are there.

1. Lay main column on it's side with the base at the footing position and feed electrical cable through base plate into the conduit for connection by electrician. Ensure cable is fed out of the top of the angled boom spigot. Stand and position base in correct alignment by positioning the angled column spigot where it is to be positioned. Once positioning is correct, bolt down.
2. Feed the cable through angled boom and fit it to the main column.
3. Ensure that top plate is perfectly horizontal, insert both 16mm x 45mm bolts with Nylon and stainless washers and tension to correct torque. Seal join with silicone.

Jack Assembly

This part may require 3 people if you do not have an installation jack as the assembly is very heavy.

1. Looking at the top of the jack assembly you will see an arrow with the column marked. Ensure this arrow directly faces towards the main column.
2. Lift the assembly up to the top plate on the main arm and feed cable through jack assembly top plate and out through the cable hole, immediately below the top plate, guide the mounting bolts through the top plate, loosely fitting the M12 nyloc nuts with washers to support the assembly.
3. Partially wind umbrella up while supporting all arms and checking cable within corner plate, canopy position, centering and align of arms with associated seams. Continue to wind until canopy is reasonably taut and check the canopy is sitting evenly over the top plate (this step is to allow canopy to seat on the frame properly).
4. Retract the umbrella and fully tighten the nuts on the top plate to correct torque and wind the umbrella up until the edge cable is taut.
5. Engage the anti-creep latch.
6. Grout the gap under the base plate with non-shrink grout and ensure the umbrella is clean.
7. Bolt lights to the desired bolt at top plate.

**NOTE: Always engage anti creep lock under mechanism to stop canopy creeping down.
Keep foam arm keeper and umbrella strap for use when umbrella is retracted.**