

EQASCOM Movement Strategies

EQASCOM provides two movement strategies.

Normal: RA and DEC move simultaneously to their target positions

Safe: This movement is used when moving from or to an Outside Limits position. The RA axis is first moved to the RA home position, the DEC axis then moves to its target position and finally the RA axis then moves to its target position. This is safer than the the "Normal" slewing method because whilst entering/leaving the "Outside Limits" zone only the RA axis is moving and so the mount will take the same final approach to a given position irrespective of starting position.

If RA limits are applied then they will set the range over which will "normal" slewing will occur. Gotos/Parks/Unparks to/from positions outside of the limits will be implemented using a safe goto.

If RA limits are off then all movements from counter weight down (CW down) positions will be performed as simultaneous RA/DEC. Movements from counter weights up (CW UP) positions (i.e. where the mount has tracked over the meridian) are implemented using the Safe method.

Limits Not Applied

Start	Destination	Operation	Flipped Goto		Movement Type	Comment
CW Down	Anywhere	Goto/Park/Unpark	No		Normal	
CW Up	Anywhere	Goto/Park/Unpark	No		Safe	Mount may have tracked into a position where any DEC movement causes collision so safe moves are used.
Anywhere	Anywhere	Goto	Yes		Safe	Flipped gotos can go to any target position – user must supervise and stop if collision is likely

Limits Applied

Start	Destination	Operation	Flipped Goto	Limits applied to Goto	Movement Type	Comment
Within Limits	Within Limits	Goto	Yes or No	Yes or No	Normal	
Within Limits	Outside Limits	Goto	Yes		Normal	The flipped goto request is ignored and a standard goto is performed instead.
Anywhere	Outside Limits	Goto	No	Yes or No	NONE	Goto out of limit position can't be initiated.
Outside Limits	Anywhere	Goto	Yes or No	Yes	NONE	Limit will prevent goto
Outside Limits	Within Limits	Goto	Yes or No	No	Safe	
Within Limits	Within Limits	Park Unpark	N/A	N/A	Normal	
Within Limits	Outside Limits	Park Unpark	N/A	N/A	Safe	
Outside Limits	Within Limits	Park Unpark	N/A	N/A	Safe	
Outside Limits	Outside Limits	Park Unpark	N/A	N/A	Safe	