True altitude

	°	'
Sextant altitude:		
Index error:		
= Observed altitude:		
− DIP:		
= Apparent altitude:		
+ Total Corrections:		
= True altitude:		

AA = *Apparent altitude*
TC = *Total corrrections*

Height of eye	0.7m	1.3 m	2.0m	2.9m	3.9m
DIP	-1.5'	-2.0'	-2.5'	-3.0'	-3.5'
AA	>13° 15° 17°	20°	24° 31° 41°	59°	85°
TC	12' 12.5' 13'	13.5'	14' 14.5' 15'	15.5'	16'

From the nautical almanac

	°	'
GHA whole hours:		
+ GHA correction:		
= GHA		
− W / + E latitude:		
= LHA:		

Assumed position:

Assumed longitude W/E

Assumed latitude N/S

Remember:

Correction for d is added if lat. and dec. have same name and subtracted if they have opposite (contrary) name. Position line to be moved towards the sun if true altitude is greater than tabulated altitude and away from the sun if true altitude is less than tabulated altitude.

Date: ☐   Log: ☐

DR position : ☐

UTC at observation: ☐

Declination: ☐

Log at local noon: ☐

Mer. Pass. Greewich.: ☐

Estimated Mer. Pass.: ☐

From Pub. No. 249

	°	'
Hc (tabulated alt.):		
+ d-correction:	+	
= Hc corrected:		
−True altitude:		
= Alt. diff. (Intercept):		

d = [ ]'   [ ]° **Z**

+: *away from sun*
−: *towards sun*   [ ]° **Zn**

True bearing

N latitude:	
LHA>180°	Zn= Z
LHA<180°	Zn= 360° −Z
S latitude:	
LHA>180°	Zn=180° −Z
LHA<180°	Zn=180° +Z

Latitude from the noon sight

	°	'
90° =		
− True altitude:		
= MZD:		
+ Declination:		
= Latitude:		

Calculations / Notes