

EXERCISE 18.0

DETERMINING STELLAR MAGNITUDES

Table 2
Data from Charts for Standard Stars of Known Magnitudes

ζ Hyd				ρ Hyd			
Filters	V	B	U	Filters	V	B	U
Star Reading				Star Reading			
Sky Reading				Sky Reading			
Net Reading				Net Reading			
Amp. Setting				Amp. Setting			
b= NR x Amp. Set log b				b= NR x Amp. Set log b			
ϵ Tau							
Filters	V	B	U				
Star Reading							
Sky Reading							
Net Read							
Amp. Setting							
b= NR x Amp. Set log b							

Table 3
Values of Calibration Constants Calculated from $C=m+2.5\log(b)$

Star	C_v	C_b	C_u
ζ Hyd			
ρ Hyd			
ϵ Tau			
Mean Value			

Table 4

Data for Stars of Unknown Magnitudes

V834 Ori			
Filters	V	B	U
Star Reading			
Sky Reading			
Net Reading			
Amp. Setting			
b = NR x Amp. Set			
log b			
magnitude			

θ Hyd			
Filters	V	B	U
Star Reading			
Sky Reading			
Net Read			
Amp. Setting			
b = NR x Amp. Set			
log b			
magnitude			