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UBV OBSERVATIONS OF SYMBIOTIC STARS IN
 JULY AND OCTOBER 1982

The observations were made using the Polarimeter II Martel (Chevreton et al. 1977) mounted at the Cassegrain focus of the 80 cm telescope at the Haute-Provence Observatory. Polarization measurements for the observed symbiotic stars did not yield significant results.

Each measurement relating to a variable star is given within the limits taken from similar measurements made for one or more comparison stars as indicated below:

Variable Stars	Comparison Stars
AG Dra	BD +67 ^o 925
CH Cyg	BD +49 ^o 2994
HM Sge	BD +28 ^o 3438
CI Cyg	BD + 35 ^o 3964, BD +35 ^o 3825, BD +35 ^o 3821
V 1016 Cyg	HD 194 279
HBV 475	No.1 NGC 6910
AG Peg	BD +11 ^o 4681
Z And	BD +48 ^o 4066, BD +47 ^o 4192
EG And	HD 3765
AX Per	No.2 NGC 581, BD +53 ^o 340
MWC 17	No.2 NGC 581
RW Aur	BD +30 ^o 748

The results of UBV measurements of the variable stars are given in Table I, together with the date and time in hundredths of the Julian day of the observation.

Our values of UBV for Z And, AG Peg and CI Cyg are in good agreement with results obtained by Belyakina (1984 and 1985) except that the values of U-B for CI Cyg are much lower than the minimum read from the curve given by Belyakina for CI Cyg in 1982.

If all the measured stars, with the exception of EG And, have U-B values between -0.30 and -1.10, the B-V values can be used to divide the stars into two classes :

- 1) those of type Z And with $B-V > 1$ magnitude
- 2) [BQ] stars and protoplanetary nebulae with $0.10 < B-V < 0.70$ magnitude.

Table I

UBV magnitudes of symbiotic stars observed in July and October 1982

Stars	JD 2 445 000+	V	B-V	U-R
AG Dra	174.46	9.53±0.02	+ 1.04±0.03	- 0.89±0.07
CH Cyg	174.50	5.75±0.006	+ 0.45±0.01	- 0.77±0.01
HM Sge	177.50	11.47±0.015	+ 0.14±0.03	- 0.41±0.05
CI Cyg	173.48	10.50±0.03	+ 1.16±0.05	- 0.23±0.05
	258.39	11.28±0.02	+ 1.65±0.04	- 0.37±0.10
	263.43	11.24±0.02	+ 1.53±0.04	- 0.25±0.10
V 1016 Cyg	178.49	11.23±0.01	+ 0.10±0.03	- 0.98±0.03
HBV 475	264.42	12.88±0.02	+ 0.68±0.04	- 1.08±0.08
AG Peg	173.54	8.31±0.01	+ 0.99±0.02	
Z And	174.55	10.53±0.01	+ 1.35±0.02	- 0.49±0.04
	262.45	10.74±0.005	+ 1.10±0.03	- 1.02±0.05
EG And	263.53	7.22±0.01	+ 1.71±0.02	+ 1.61±0.05
AX Per	262.51	11.48±0.01	+ 1.38±0.04	- 0.63±0.05
MWC 17	262.56	11.66±0.02	+ 0.42±0.03	- 0.20±0.04
RW Aur	263.56	10.66±0.01	+ 0.52±0.03	- 0.30±0.04

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