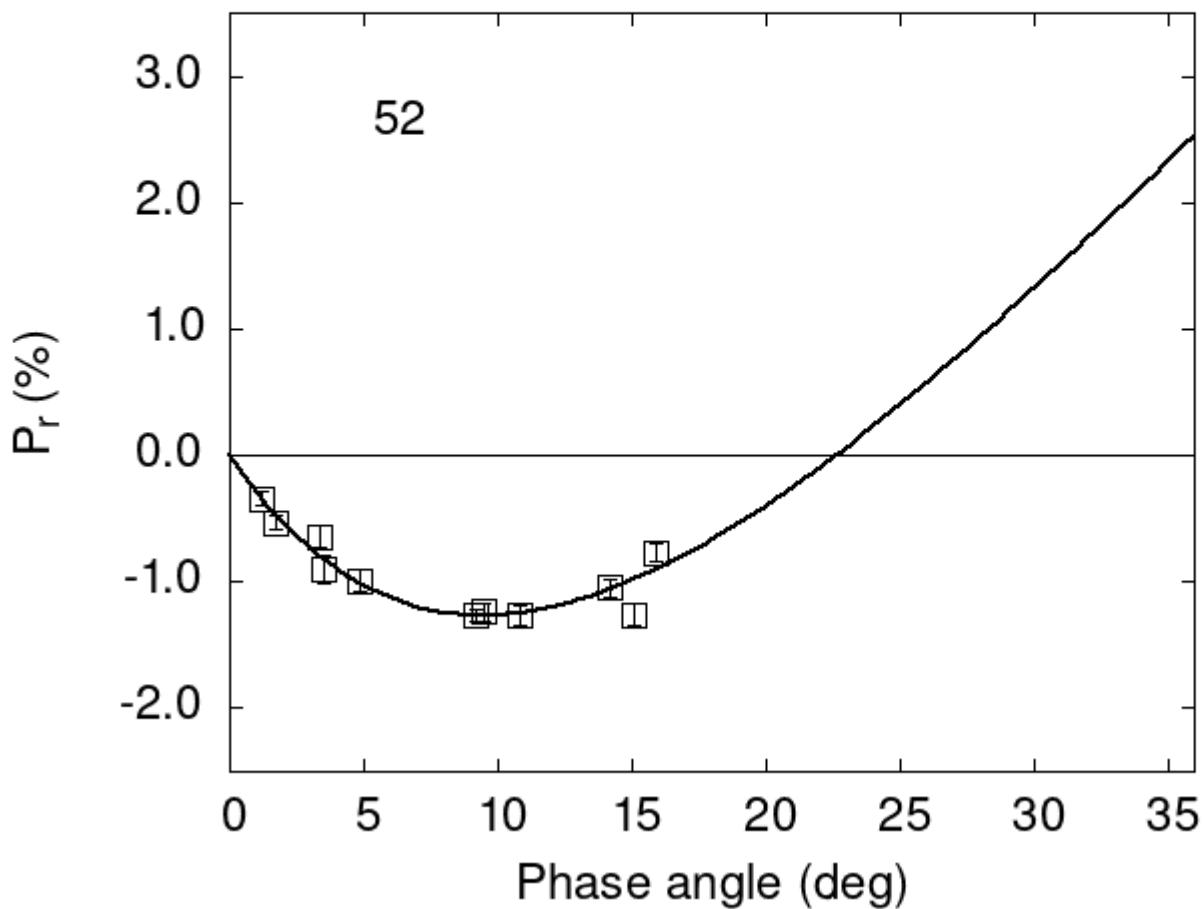


# Catalogue of Asteroid Polarization Curves

Gil-Hutton (2023)



## Polarimetric data:

The columns list the object number, the phase angle (degrees),  $P_r$  (%), its error, the filter used, and the reference code.

52	3.37	-0.64	0.09	V	f
52	4.85	-0.99	0.09	V	f
52	15.12	-1.26	0.09	V	f
52	9.20	-1.26	0.05	V	a
52	1.70	-0.53	0.05	V	a
52	1.20	-0.34	0.06	V	a

```

52  9.50 -1.24 0.07 V a
52 14.20 -1.05 0.07 V a
52 10.80 -1.27 0.08 V a
52 15.90 -0.77 0.07 V a
52  3.50 -0.90 0.11 V a

```

## Polarization Curve Parameters:

The polarimetric parameters were obtained fitting the observations to a polarization curve using the function:

$$P_r(\alpha) = Coe_1 \times \left[ \exp\left(-\frac{\alpha}{Coe_2}\right) - 1 \right] + Coe_3 \times \alpha,$$

where  $\alpha$  is the phase angle in degrees. The minimum of the polarization curve is identified by Pmin, Phmin is the phase angle where Pmin is reached, Ph0 is the inversion angle, and k is the slope of the polarization curve at Ph0.

```

#
#      Coe1      eCoe1      Coe2      eCoe2      Coe3      eCoe3
#  5.9447   0.3676  10.9798   0.5491   0.2290   0.0146
#
#      Phmin     err     Pmin     err    Ph0     err      k      err
#    9.45   0.98 -1.266   0.275 22.65   0.25 0.1602  0.0156

```