**data** old;

input dist r numb;

prob=r/numb;

wt=numb\*prob\*(**1**-prob);

pprime=log(prob/(**1**-prob));

cards;

50 1 28

80 2 28

90 3 28

110 4 28

110 5 28

130 6 28

150 7 28

150 8 28

160 9 28

160 10 28

160 11 28

160 12 28

160 13 28

180 14 28

180 15 28

190 16 28

190 17 28

210 18 28

210 19 28

220 20 28

230 21 28

270 22 28

300 23 28

300 24 28

360 25 28

410 26 28

450 27 28

550 28 28

;;;;

**proc** **print**;

title 'data for logistic regression';

var dist r numb prob pprime wt;

**proc** **glm**;

weight wt;

model pprime=dist/P;

output out=new predicted=yhat residual=resid;

**proc** **plot** data=new;

plot resid\*yhat/vref=**0** vpos=**20** hpos=**40**;

**proc** **plot**; plot prob\*dist='+'/vpos=**20** hpos=**40**;

**proc** **plot**; plot pprime\*dist='+'/vpos=**20** hpos=**40**;

**run**;