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LOGISTIC REGRESSION VARIABLES GC
  /METHOD=ENTER ROA CR LNDER BIG4 IPCG
  /CASEWISE OUTLIER(2)
  /PRINT=GOODFIT
  /CRITERIA=PIN(0.05) POUT(0.10) ITERATE(20) CUT(0.5) .

```

## Logistic Regression

### Notes

Output Created		18-JUN-2016 19:52:16
Comments		
	Data	C:\Users\abigail\Documents\ABI GAIL 22.sav
	Active Dataset	DataSet1
Input	Filter	<none>
	Weight	<none>
	Split File	<none>
	N of Rows in Working Data File	36
Missing Value Handling	Definition of Missing	User-defined missing values are treated as missing LOGISTIC REGRESSION VARIABLES GC /METHOD=ENTER ROA CR LNDER BIG4 IPCG /CASEWISE OUTLIER(2) /PRINT=GOODFIT /CRITERIA=PIN(0.05) POUT(0.10) ITERATE(20) CUT(0.5).
Syntax		
Resources	Processor Time	00:00:00.03
	Elapsed Time	00:00:00.04

### Case Processing Summary

Unweighted Cases <sup>a</sup>		N	Percent
	Included in Analysis	36	100.0
Selected Cases	Missing Cases	0	.0
	Total	36	100.0
Unselected Cases		0	.0
Total		36	100.0

a. If weight is in effect, see classification table for the total number of cases.

### Dependent Variable Encoding

Original Value	Internal Value
.00	0
1.00	1

### Classification Table<sup>a,b</sup>

	Observed	Predicted		
		GC		Percentage Correct
		.00	1.00	
Step 0	GC	.00	1.00	
		0	12	.0
		0	24	100.0
	Overall Percentage			66.7

a. Constant is included in the model.

b. The cut value is .500

### Variables in the Equation

	B	S.E.	Wald	df	Sig.	Exp(B)
Step 0 Constant	.693	.354	3.844	1	.050	2.000

## Variables not in the Equation

		Score	df	Sig.
Step 0	Variables			
	ROA	2.864	1	.091
	CR	.339	1	.560
	LNDER	.181	1	.671
	BIG4	3.853	1	.050
	IPCG	1.237	1	.266
	Overall Statistics	11.258	5	.047

## Omnibus Tests of Model Coefficients

		Chi-square	df	Sig.
Step		17.857	5	.003
Step 1	Block	17.857	5	.003
	Model	17.857	5	.003

## Model Summary

Step	-2 Log likelihood	Cox & Snell R Square	Nagelkerke R Square
1	27.972 <sup>a</sup>	.391	.543

a. Estimation terminated at iteration number 6 because parameter estimates changed by less than .001.

## Contingency Table for Hosmer and Lemeshow Test

		GC = .00		GC = 1.00		Total
		Observed	Expected	Observed	Expected	
Step 1	1	4	3.721	0	.279	4
	2	2	2.858	2	1.142	4
	3	4	2.274	0	1.726	4
	4	0	1.383	4	2.617	4
	5	1	.740	3	3.260	4
	6	0	.454	4	3.546	4
	7	0	.341	4	3.659	4
	8	1	.162	3	3.838	4
	9	0	.068	4	3.932	4

### Hosmer and Lemeshow Test

Step	Chi-square	df	Sig.
1	11.956	7	.102

### Variables in the Equation

	B	S.E.	Wald	df	Sig.	Exp(B)	
Step 1 <sup>a</sup>	ROA	-.620	.250	6.158	1	.013	.538
	CR	-.009	.010	.846	1	.358	.991
	LNDER	-2.158	1.537	1.970	1	.160	.116
	BIG4	-3.172	1.253	6.404	1	.011	.042
	IPCG	19.038	8.010	5.649	1	.017	185303236.316
	Constant	-3.561	3.176	1.257	1	.262	.028

a. Variable(s) entered on step 1: ROA, CR, LNDER, BIG4, IPCG.

### Classification Table<sup>a</sup>

	Observed	Predicted		
		GC		Percentage Correct
		.00	1.00	
Step 1	GC .00	10	2	83.3
	GC 1.00	2	22	91.7
Overall Percentage				88.9

a. The cut value is .500

### Casewise List<sup>b</sup>

Case	Selected Status <sup>a</sup>	Observed	Predicted	Predicted Group	Temporary Variable	
		GC			Resid	ZResid
21	S	0**	.968	1	-.968	-5.460

a. S = Selected, U = Unselected cases, and \*\* = Misclassified cases.

b. Cases with studentized residuals greater than 2.000 are listed.

ANOVA<sup>a</sup>

Model	Sum of Squares	df	Mean Square	F	Sig.
1 Regression	1.857	4	.464	2.342	.077 <sup>b</sup>
Residual	6.143	31	.198		
Total	8.000	35			

a. Dependent Variable: GC

b. Predictors: (Constant), LNDER, BIG4, ROA, CR

## Regression

### Notes

Output Created	18-JUN-2016 20:04:29
Comments	
Input	Data Active Dataset Filter Weight Split File N of Rows in Working Data File Definition of Missing Missing Value Handling Cases Used
Syntax	C:\Users\abigail\Documents\ABI GAIL 22.sav DataSet1 <none> <none> <none> 36 User-defined missing values are treated as missing. Statistics are based on cases with no missing values for any variable used. REGRESSION /MISSING LISTWISE /STATISTICS COEFF OUTS R ANOVA COLLIN TOL /CRITERIA=PIN(.05) POUT(.10) /NOORIGIN /DEPENDENT GC /METHOD=ENTER ROA CR BIG4 LNDER /SCATTERPLOT=(*SRESID ,*ZPRED) /RESIDUALS DURBIN NORMPROB(ZRESID).

Resources	Processor Time	00:00:02.25
	Elapsed Time	00:00:01.52
	Memory Required	2348 bytes
	Additional Memory Required for Residual Plots	544 bytes

#### Model Summary<sup>b</sup>

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate	Durbin-Watson
1	.482 <sup>a</sup>	.232	.133	.44516	2.407

a. Predictors: (Constant), LNDER, BIG4, ROA, CR

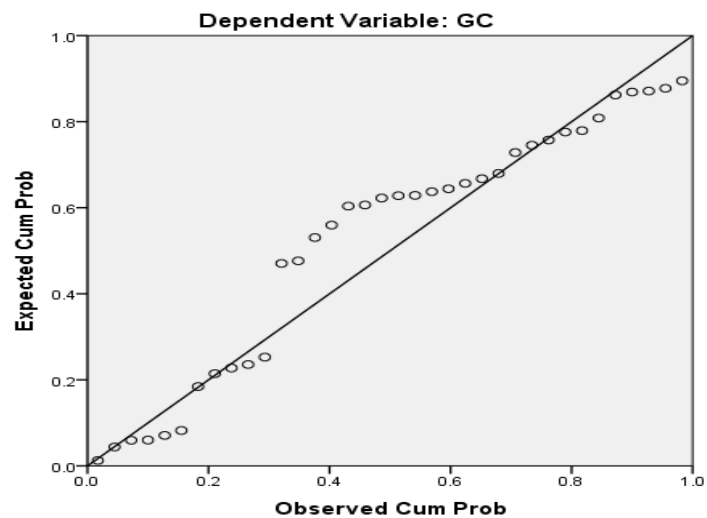
b. Dependent Variable: GC

#### Residuals Statistics<sup>a</sup>

	Minimum	Maximum	Mean	Std. Deviation	N
Predicted Value	.0263	1.0328	.6667	.23032	36
Std. Predicted Value	-2.780	1.590	.000	1.000	36
Standard Error of Predicted Value	.099	.296	.160	.046	36
Adjusted Predicted Value	.0002	1.2167	.6691	.26085	36
Residual	-.99611	.55809	.00000	.41895	36
Std. Residual	-2.238	1.254	.000	.941	36
Stud. Residual	-2.473	1.678	-.003	1.029	36
Deleted Residual	-1.21673	.99978	-.00239	.50561	36
Stud. Deleted Residual	-2.715	1.731	-.017	1.060	36
Mahal. Distance	.752	14.491	3.889	3.018	36
Cook's Distance	.000	.446	.045	.096	36
Centered Leverage Value	.021	.414	.111	.086	36

a. Dependent Variable: GC

Normal P-P Plot of Regression Standardized Residual



Descriptive Statistics

	N	Minimum	Maximum	Mean	Std. Deviation
ROA	60	-859.00	347.47	-9.4854	121.64999
CR	60	.23	386.28	98.0325	80.42413
DAR	60	-44.71	27.98	.2066	9.46243
BIG4	60	.00	1.00	.3393	.47775
IPCG	60	.00	.65	.3580	.16052
CG	60	.00	1.00	.6333	.48596
Valid N (listwise)	55				

One-Sample Kolmogorov-Smirnov Test

	ROA	CR	DAR	BIG4	IPCG	GC	LNDER
N	36	36	36	36	36	36	36
Mean	.0853	117.2958	3.7664	.3611	.3889	.6667	.3424
Normal Parameters <sup>a,b</sup>							
Std. Deviation	4.54823	58.82029	5.34228	.48714	.12790	.47809	.40737
Absolute	.167	.192	.297	.410	.156	.424	.209
Most Extreme Differences							
Positive	.085	.192	.297	.410	.099	.252	.209
Negative	-.167	-.095	-.275	-.266	-.156	-.424	-.110
Kolmogorov-Smirnov Z	1.002	1.153	1.781	2.458	.936	2.543	1.256
Asymp. Sig. (2-tailed)	.267	.140	.004	.000	.345	.000	.085

a. Test distribution is Normal.

b. Calculated from data.

