LAMPIRAN

Lampiran 1 : Daftar Perusahaan

No	Kode/Nama Perusahaan	Nama Emiten	Tanggal IPO
1	ADRO	Adaro Energy Tbk.	16-Jul-08
2	ATPK	ATPK Research Tbk.	17-Apr-02
3	ARII	Atlas Resources Tbk.	08-Nov-11
4	BORN	Borneo Lumbung Energi & Metal	26-Nov-10
5	BRAU	Berau Coal Energy Tbk.	19-Agu-10
6	BOSS	Borneo Olah Sarana Sukses Tbk.	15-Feb-18
7	BRMS	Bumi Resources Minerals Tbk.	09-Des-10
8	BSSR	Baramulti Suksessarana Tbk.	08-Nov-12
9	BUMI	Bumi Resources Tbk.	30-Jul-90
10	BYAN	Bayan Resources Tbk.	12-Agu-08
11	DEWA	Darma Henwa Tbk	26-Sep-07
12	DOID	Delta Dunia Makmur Tbk.	15-Jun-01
13	DSSA	Dian Swastatika Sentosa Tbk	10-Des-09
14	FIRE	Alfa Energi Investama Tbk.	09-Jun-17
15	GEMS	Golden Energy Mines Tbk.	17-Nov-11
16	GTBO	Garda Tujuh Buana Tbk	09-Jul-09
17	HRUM	Harum Energy Tbk.	06-Okt-10
18	INDY	Indika Energy Tbk.	11-Jun-08
19	ITMG	Indo Tambangraya Megah Tbk.	18-Des-07
20	KKGI	Resource Alam Indonesia Tbk.	01-Jul-91
21	MBAP	Mitrabara Adiperdana Tbk.	10-Jul-14
22	MYOH	Samindo Resources Tbk.	27-Jul-00

23	PKPK	Perdana Karya Perkasa Tbk	11-Jul-07
24	PTBA	Bukit Asam Tbk.	23-Des-02
25	PTRO	Petrosea Tbk.	21-Mei-90
26	SMMT	Golden Eagle Energy Tbk.	01-Des-07
27	TOBA	Toba Bara Sejahtra Tbk.	06-Jul-12
28	TRAM	Trada Alam Minera Tbk.	10-Sep-08

Lampiran 2 : Hasil Olahan Dat Menggunakan Ms. Excel

ANALISA DESKRIPTIF					
Current Liabilities		**OCF**		**Total Debt**	
Mean	3,47501E+12	Mean	1,03679E+12	Mean	5,02644E+12
Standard Error	7,2025E+11	Standard Error	1,80451E+11	Standard Error	8,78199E+11
Median	1,4367E+12	Median	3,56353E+11	Median	1,00082E+12
Mode	#N/A	Mode	#N/A	Mode	10000000000
Standard Deviation	8,52212E+12	Standard Deviation	2,13513E+12	Standard Deviation	1,0391E+13
Sample Variance	7,26265E+25	Sample Variance	4,55877E+24	Sample Variance	1,07973E+26
Kurtosis	52,17374654	Kurtosis	11,89712155	Kurtosis	13,39194959
Skewness	6,833031961	Skewness	3,114296843	Skewness	3,472116686
Range	7,58083E+13	Range	1,5131E+13	Range	6,0784E+13
Minimum	41546416128	Minimum	-2,22828E+12	Minimum	402375808
Maximum	7,58499E+13	Maximum	1,29027E+13	Maximum	6,07844E+13
Sum	4,86502E+14	Sum	1,4515E+14	Sum	7,03702E+14
Count	140	Count	140	Count	140
Largest(1)	7,58499E+13	Largest(1)	1,29027E+13	Largest(1)	6,07844E+13
Smallest(1)	41546416128	Smallest(1)	-2,22828E+12	Smallest(1)	402375808

Confidence Level(95,0%)	1,42406E+12	Confidence Level(95,0%)	3,56784E+11	Confidence Level(95,0%)	1,73636E+12
Firm Size		**Lev**		**TBQ**	
Mean	12,760005	Mean	0,29530522	Mean	1,1335451
Standard Error	0,0523945	Standard Error	0,02901012	Standard Error	0,0806632
Median	12,713124	Median	0,26107276	Median	0,8401361
Mode	#N/A	Mode	#N/A	Mode	#N/A
Standard Deviation	0,61994	Standard Deviation	0,34325242	Standard Deviation	0,9544202
Sample Variance	0,3843256	Sample Variance	0,11782223	Sample Variance	0,9109178
Kurtosis	-0,3907323	Kurtosis	10,1174454	Kurtosis	20,784101
Skewness	-0,1174156	Skewness	2,96245181	Skewness	3,6425352
Range	2,8369876	Range	2,01238883	Range	7,9732673
Minimum	11,17104	Minimum	0,0002952	Minimum	0,1020002
Maximum	14,008027	Maximum	2,01268403	Maximum	8,0752675
Sum	1786,4007	Sum	41,3427303	Sum	158,69631
Count	140	Count	140	Count	140
Largest(1)	14,008027	Largest(1)	2,01268403	Largest(1)	8,0752675
Smallest(1)	11,17104	Smallest(1)	0,0002952	Smallest(1)	0,1020002
Confidence Level(95,0%)	0,1035932	Confidence Level(95,0%)	0,05735817	Confidence Level(95,0%)	0,1594855

ROA		Working Capital Ratio	
Mean	3,8048608	Mean	-0,038435
Standard Error	1,0799042	Standard Error	0,08079531
Median	2,4881895	Median	0,12888435
Mode	0,398669	Mode	#N/A
Standard Deviation	12,777599	Standard Deviation	0,95598297
Sample Variance	163,26704	Sample Variance	0,91390344
Kurtosis	6,8860164	Kurtosis	37,2896241
Skewness	-0,2280225	Skewness	-5,9577952
Range	106,43134	Range	8,06933165
Minimum	-57,36116	Minimum	-6,840775
Maximum	49,070175	Maximum	1,22855668
Sum	532,68052	Sum	-5,380904
Count	140	Count	140
Largest(1)	49,070175	Largest(1)	1,22855668
Smallest(1)	-57,36116	Smallest(1)	-6,840775
Confidence Level(95,0%)	2,1351626	Confidence Level(95,0%)	0,15974668

Lampiran 3 : Hasil Olah Data Gretl Software

Model 1: Pooled OLS, using 140 observations
Included 28 cross-sectional units
Time-series length = 5
Dependent variable: TBQ

	Coefficient	*Std. Error*	*t-ratio*	*p-value*	
const	4,41941	1,64235	2,691	0,0080	***
WorkingCapitalRatio	0,118065	0,0836776	1,411	0,1606	
Currentratio	0,00454245	0,0251325	0,1807	0,8568	
OCFratiotodebts	0,000348533	0,00259805	0,1342	0,8935	
ROA	0,0198180	0,00680842	2,911	0,0042	***
firmsize	−0,280477	0,129650	−2,163	0,0323	**
Lev	0,710720	0,244224	2,910	0,0042	***

Mean dependent var	1,133545	S.D. dependent var	0,954420
Sum squared resid	111,0999	S.E. of regression	0,913968
R-squared	0,122555	Adjusted R-squared	0,082971
F(6, 133)	3,096078	P-value(F)	0,007181
Log-likelihood	−182,4665	Akaike criterion	378,9331
Schwarz criterion	399,5246	Hannan-Quinn	387,3009
rho	0,361710	Durbin-Watson	0,686458

Test for normality of residual -
Null hypothesis: error is normally distributed
Test statistic: Chi-square(2) = 333,224
with p-value = 4,37921e-073

White's test for heteroskedasticity -
Null hypothesis: heteroskedasticity not present
Test statistic: LM = 11,6037
with p-value = P(Chi-square(27) > 11,6037) = 0,995669

Chow test for structural break at observation 14:5 -
Null hypothesis: no structural break
Test statistic: F(7, 126) = 0,945499
with p-value = P(F(7, 126) > 0,945499) = 0,474184

Uji Collinearity

Variance Inflation Factors
Minimum possible value = 1.0
Values > 10.0 may indicate a collinearity problem

WorkingCapitalRatio 1,065
Currentratio 1,030
OCFratiotodebts 1,175
ROA 1,259
firmsize 1,075
Lev 1,169

VIF(j) = 1/(1 - R(j)^2), where R(j) is the multiple correlation coefficient
between variable j and the other independent variables

Belsley-Kuh-Welsch collinearity diagnostics:

variance proportions

lambda	cond	const	WorkingC~	Currentr~	OCFratio~	ROA	firmsize	Lev
3,067	1,000	0,000	0,000	0,033	0,007	0,011	0,000	0,026
1,418	1,471	0,000	0,101	0,000	0,198	0,190	0,000	0,043
0,969	1,780	0,000	0,699	0,056	0,135	0,025	0,000	0,000
0,672	2,136	0,000	0,170	0,355	0,200	0,102	0,000	0,178
0,565	2,330	0,000	0,004	0,300	0,450	0,496	0,000	0,021
0,309	3,153	0,001	0,001	0,255	0,002	0,171	0,001	0,698
0,001	52,846	0,998	0,024	0,000	0,009	0,005	0,998	0,033

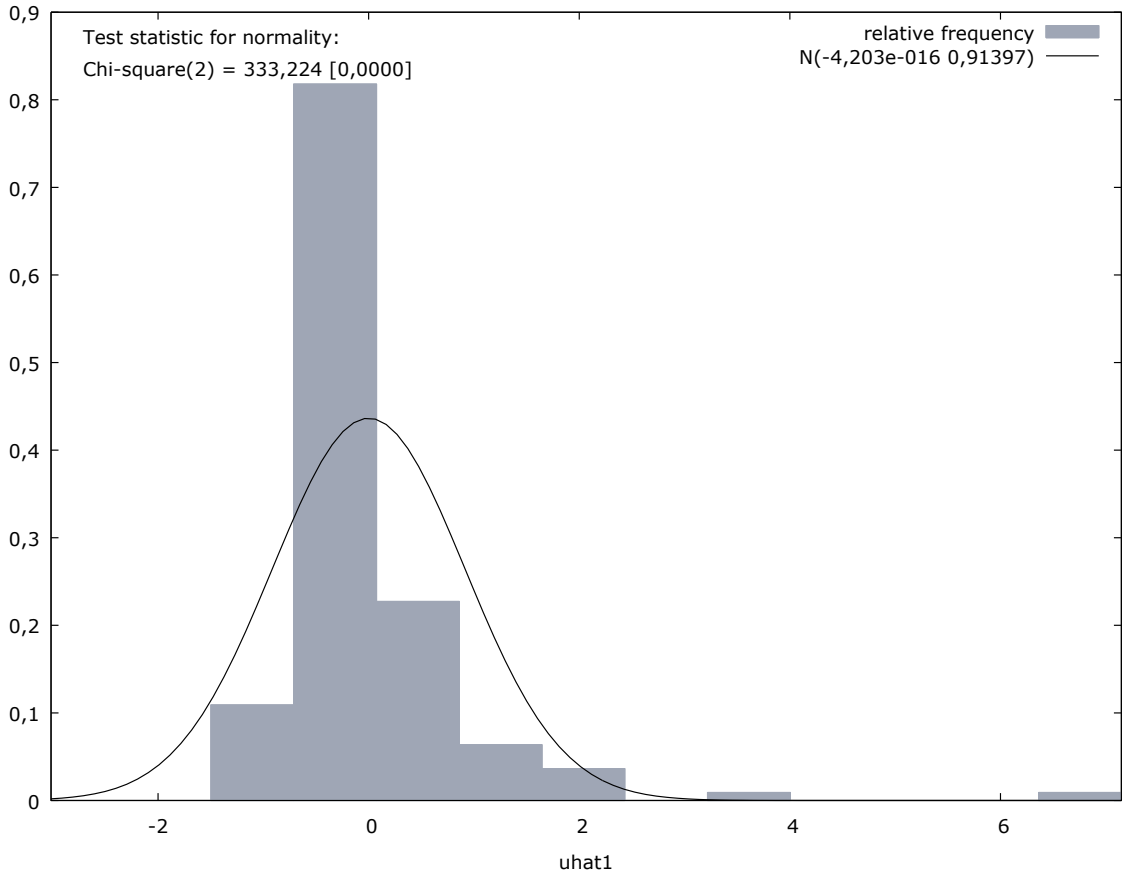
lambda = eigenvalues of inverse covariance matrix (smallest is 0,00109828)
cond = condition index
note: variance proportions columns sum to 1.0

According to BKW, cond >= 30 indicates "strong" near linear dependence,
and cond between 10 and 30 "moderately strong". Parameter estimates whose
variance is mostly associated with problematic cond values may themselves
be considered problematic.

Count of condition indices >= 30: 1
Variance proportions >= 0.5 associated with cond >= 30:

const	firmsize
0,998	0,998

Count of condition indices >= 10: 1



Frequency distribution for uhat1, obs 1-140
number of bins = 11, mean = -4,20299e-016, sd = 0,913968

interval	midpt	frequency	rel.	cum.	
< -0,71166	-1,1046	12	8,57%	8,57%	***
-0,71166 - 0,074312	-0,31867	90	64,29%	72,86%	**********
0,074312 - 0,86028	0,46730	25	17,86%	90,71%	******
0,86028 - 1,6463	1,2533	7	5,00%	95,71%	*
1,6463 - 2,4322	2,0392	4	2,86%	98,57%	*
2,4322 - 3,2182	2,8252	0	0,00%	98,57%	
3,2182 - 4,0042	3,6112	1	0,71%	99,29%	
4,0042 - 4,7901	4,3971	0	0,00%	99,29%	
4,7901 - 5,5761	5,1831	0	0,00%	99,29%	
5,5761 - 6,3621	5,9691	0	0,00%	99,29%	
>= 6,3621	6,7551	1	0,71%	100,00%	

Test for null hypothesis of normal distribution:
Chi-square(2) = 333,224 with p-value 0,00000

HETEROSKEDASTICITY

White's test for heteroskedasticity
OLS, using 140 observations

Dependent variable: uhat^2

	coefficient	std. error	t-ratio	p-value
const	134,218	161,125	0,8330	0,4066
WorkingCapitalRa~	11,0779	47,8449	0,2315	0,8173
Currentratio	1,08554	7,76868	0,1397	0,8891
OCFratiotodebts	−0,422743	1,82084	−0,2322	0,8168
ROA	−0,554927	1,22061	−0,4546	0,6503
firmsize	−20,7477	25,9652	−0,7991	0,4259
Lev	61,9541	47,2360	1,312	0,1923
sq_WorkingCapita~	−0,214525	0,478262	−0,4486	0,6546
X2_X3	−1,41765	2,07974	−0,6816	0,4969
X2_X4	0,343245	0,550086	0,6240	0,5339
X2_X5	−0,0613137	0,343512	−0,1785	0,8587
X2_X6	−0,808540	3,92121	−0,2062	0,8370
X2_X7	1,58509	7,90415	0,2005	0,8414
sq_Currentratio	0,00829136	0,0310476	0,2671	0,7899
X3_X4	−0,00577360	0,0203817	−0,2833	0,7775
X3_X5	−0,0164904	0,0697781	−0,2363	0,8136
X3_X6	−0,0276281	0,625176	−0,04419	0,9648
X3_X7	−1,35768	2,39780	−0,5662	0,5724
sq_OCFratiotodeb~	−0,000253055	0,000584321	−0,4331	0,6658
X4_X5	−0,000720668	0,00169833	−0,4243	0,6721
X4_X6	0,0303734	0,137535	0,2208	0,8256
X4_X7	−1,04293	5,74477	−0,1815	0,8563
sq_ROA	−0,000470603	0,00178703	−0,2633	0,7928
X5_X6	0,0538020	0,0988489	0,5443	0,5873
X5_X7	−0,322304	0,455986	−0,7068	0,4811
sq_firmsize	0,790345	1,04901	0,7534	0,4528
X6_X7	−4,07836	3,63699	−1,121	0,2645
sq_Lev	−4,35015	2,62602	−1,657	0,1004

Unadjusted R-squared = 0,082884

Test statistic: TR^2 = 11,603697,
with p-value = P(Chi-square(27) > 11,603697) = 0,995669

CHOW TEST

Augmented regression for Chow test
OLS, using 140 observations
Dependent variable: TBQ

	coefficient	std. error	t-ratio	p-value	
const	5,91337	2,58544	2,287	0,0239	**
WorkingCapitalRa~	−0,354676	0,722967	−0,4906	0,6246	
Currentratio	0,00569980	0,191411	0,02978	0,9763	
OCFratiotodebts	−0,000598011	0,00281347	−0,2126	0,8320	
ROA	0,0256489	0,0111005	2,311	0,0225	**

firmsize	−0,384227	0,205070	−1,874	0,0633 *
Lev	0,604496	0,278566	2,170	0,0319 **
splitdum	−2,81581	3,51968	−0,8000	0,4252
sd_WorkingCapita~	0,455659	0,728577	0,6254	0,5328
sd_Currentratio	−0,00334202	0,194260	−0,01720	0,9863
sd_OCFratiotodeb~	−0,0187150	0,0268958	−0,6958	0,4878
sd_ROA	−0,0212915	0,0167176	−1,274	0,2052
sd_firmsize	0,192654	0,282106	0,6829	0,4959
sd_Lev	0,311749	0,933446	0,3340	0,7390

Mean dependent var 1,133545 S.D. dependent var 0,954420
Sum squared resid 105,5554 S.E. of regression 0,915282
R-squared 0,166345 Adjusted R-squared 0,080333
F(13, 126) 1,933975 P-value(F) 0,032064
Log-likelihood −178,8829 Akaike criterion 385,7658
Schwarz criterion 426,9488 Hannan-Quinn 402,5014

Chow test for structural break at observation 14:5
F(7, 126) = 0,945499 with p-value 0,4742

DURBIN-WATSON

Durbin-Watson statistic = 0,686458
p-value is "very small" (the Imhof integral could not
be evaluated so a definite value is not available

PANEL DIAGNOSTICS

Diagnostics: using n = 28 cross-sectional units

Fixed effects estimator
allows for differing intercepts by cross-sectional unit

	coefficient	std. error	t-ratio	p-value
const	17,8024	7,94307	2,241	0,0271 **
WorkingCapitalRa~	−0,0129417	0,0948151	−0,1365	0,8917
Currentratio	0,0180642	0,0261874	0,6898	0,4918
OCFratiotodebts	0,000917367	0,00257950	0,3556	0,7228
ROA	0,00879700	0,00775551	1,134	0,2592
firmsize	−1,31846	0,620840	−2,124	0,0360 **
Lev	0,253366	0,634273	0,3995	0,6904

Residual variance: 56,4304/(140 - 34) = 0,532362

Joint significance of differing group means:
F(27, 106) = 3,80342 with p-value 4,30287e-007
(A low p-value counts against the null hypothesis that the pooled OLS model
is adequate, in favor of the fixed effects alternative.)

Variance estimators:
 between = 0,351136
 within = 0,532362
theta used for quasi-demeaning = 0,51764

Random effects estimator
allows for a unit-specific component to the error term

	coefficient	std. error	t-ratio	p-value	
const	5,23638	2,55655	2,048	0,0425	**
WorkingCapitalRa~	0,0558672	0,0843427	0,6624	0,5089	
Currentratio	0,0190435	0,0240081	0,7932	0,4291	
OCFratiotodebts	0,000516569	0,00240153	0,2151	0,8300	
ROA	0,0129898	0,00677764	1,917	0,0574	*
firmsize	−0,343165	0,201255	−1,705	0,0905	*
Lev	0,619746	0,350099	1,770	0,0790	*

Breusch-Pagan test statistic:
 LM = 28,8318 with p-value = prob(chi-square(1) > 28,8318) = 7,8945e-008
(A low p-value counts against the null hypothesis that the pooled OLS model is adequate, in favor of the random effects alternative.)

Hausman test statistic:
 H = 7,00978 with p-value = prob(chi-square(6) > 7,00978) = 0,319944
(A low p-value counts against the null hypothesis that the random effects model is consistent, in favor of the fixed effects model.)

Model 2: Fixed-effects, using 140 observations
Included 28 cross-sectional units
Time-series length = 5
Dependent variable: TBQ

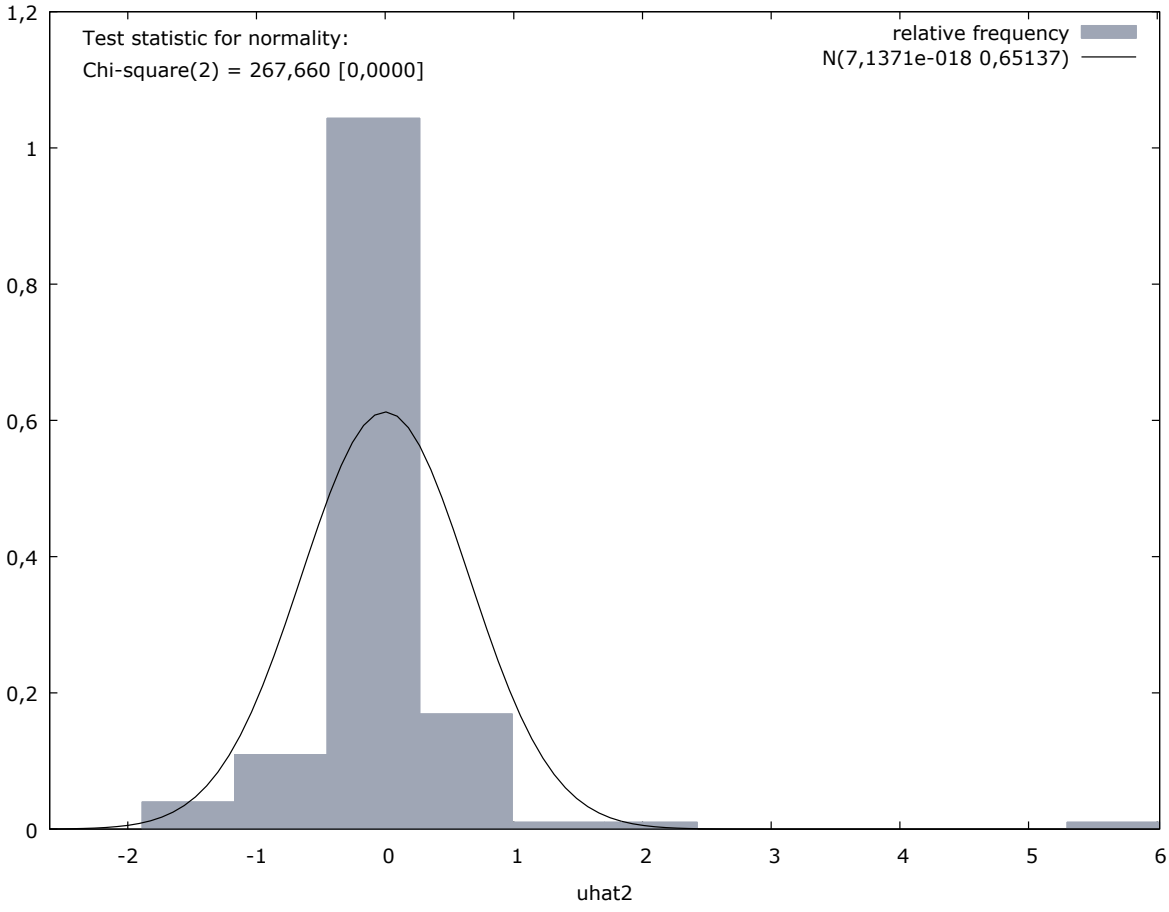
	Coefficient	*Std. Error*	*t-ratio*	*p-value*	
const	17,8024	7,94307	2,241	0,0271	**
WorkingCapitalRatio	−0,0129417	0,0948151	−0,1365	0,8917	

Currentratio	0,0180642	0,0261874	0,6898	0,4918	
OCFratiotodebts	0,000917367	0,00257950	0,3556	0,7228	
ROA	0,00879700	0,00775551	1,134	0,2592	
firmsize	−1,31846	0,620840	−2,124	0,0360	**
Lev	0,253366	0,634273	0,3995	0,6904	

Mean dependent var	1,133545	S.D. dependent var	0,954420
Sum squared resid	56,43041	S.E. of regression	0,729632
LSDV R-squared	0,554324	Within R-squared	0,058485
LSDV F(33, 106)	3,995181	P-value(F)	3,19e-08
Log-likelihood	−135,0470	Akaike criterion	338,0940
Schwarz criterion	438,1098	Hannan-Quinn	378,7374
rho	−0,000159	Durbin-Watson	1,221798

Joint test on named regressors -
Test statistic: F(6, 106) = 1,09741
with p-value = P(F(6, 106) > 1,09741) = 0,368827

Test for differing group intercepts -
Null hypothesis: The groups have a common intercept
Test statistic: F(27, 106) = 3,80342
with p-value = P(F(27, 106) > 3,80342) = 4,30287e-007



```
Frequency distribution for uhat2, obs 1-140
number of bins = 11, mean = 7,13715e-018, sd = 0,651375

       interval          midpt   frequency    rel.     cum.

          < -1,1695   -1,5289        4      2,86%    2,86% *
   -1,1695 - -0,45073  -0,81012      11      7,86%   10,71% **
  -0,45073 -  0,26806  -0,091336    105     75,00%   85,71% **************************
   0,26806 -  0,98685   0,62745      17     12,14%   97,86% ****
   0,98685 -  1,7056    1,3462        1      0,71%   98,57%
    1,7056 -  2,4244    2,0650        1      0,71%   99,29%
    2,4244 -  3,1432    2,7838        0      0,00%   99,29%
    3,1432 -  3,8620    3,5026        0      0,00%   99,29%
    3,8620 -  4,5808    4,2214        0      0,00%   99,29%
    4,5808 -  5,2996    4,9402        0      0,00%   99,29%
          >=  5,2996    5,6590        1      0,71%  100,00%

Test for null hypothesis of normal distribution:
Chi-square(2) = 267,660 with p-value 0,00000
```

HETEROSKEDASTICITY

```
Distribution free Wald test for heteroskedasticity:
 Chi-square(28) = 41318,5, with p-value = 0

Pooled error variance = 0,403074

 unit    variance
    1   0,0225085 (T = 5)
    2   0,0269431 (T = 5)
    3   0,0840019 (T = 5)
    4    0,116913 (T = 5)
    5    0,376294 (T = 5)
    6   0,0159165 (T = 5)
    7   0,0401238 (T = 5)
    8    0,325664 (T = 5)
    9    0,102711 (T = 5)
   10   0,0887498 (T = 5)
   11   0,0121768 (T = 5)
   12    0,230363 (T = 5)
   13  0,00930781 (T = 5)
   14     8,01652 (T = 5)
   15   0,0586552 (T = 5)
   16   0,0310939 (T = 5)
   17   0,0505265 (T = 5)
   18   0,0575486 (T = 5)
   19    0,104140 (T = 5)
   20   0,0767165 (T = 5)
   21   0,0224419 (T = 5)
   22   0,0118302 (T = 5)
   23   0,0465140 (T = 5)
   24   0,0148040 (T = 5)
   25     1,16999 (T = 5)
   26   0,0300729 (T = 5)
   27   0,0153728 (T = 5)
   28    0,128175 (T = 5)
```

DURBIN-WATSON

```
Durbin-Watson statistic = 1,2218
p-value = 4,63863e-006
```

Model 3: Random-effects (GLS), using 140 observations
Included 28 cross-sectional units
Time-series length = 5
Dependent variable: TBQ

	Coefficient	*Std. Error*	*z*	*p-value*	
const	5,23638	2,55655	2,048	0,0405	**
WorkingCapitalRatio	0,0558672	0,0843427	0,6624	0,5077	
Currentratio	0,0190435	0,0240081	0,7932	0,4277	
OCFratiotodebts	0,000516569	0,00240153	0,2151	0,8297	
ROA	0,0129898	0,00677764	1,917	0,0553	*
firmsize	−0,343165	0,201255	−1,705	0,0882	*
Lev	0,619746	0,350099	1,770	0,0767	*

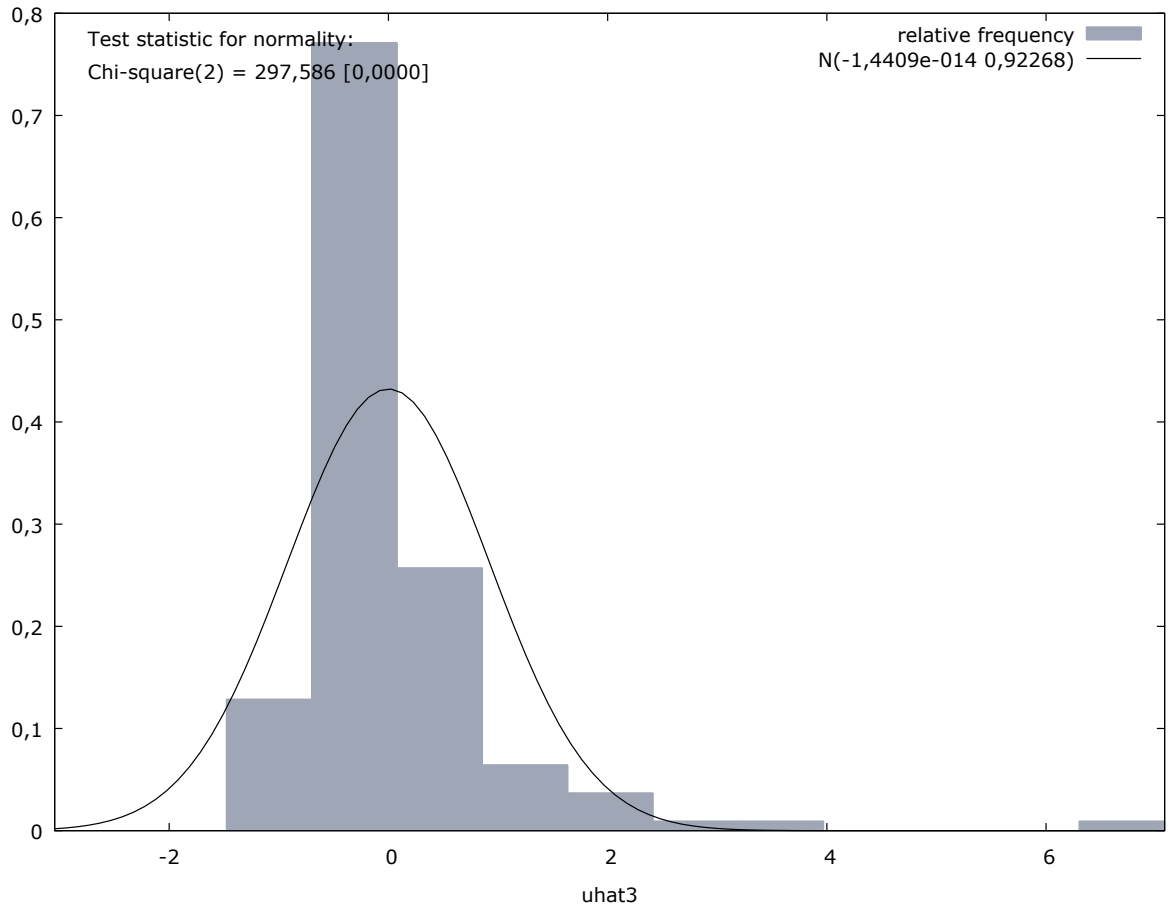
Mean dependent var	1,133545	S.D. dependent var	0,954420
Sum squared resid	113,2283	S.E. of regression	0,919232
Log-likelihood	−183,7949	Akaike criterion	381,5897
Schwarz criterion	402,1812	Hannan-Quinn	389,9575
rho	−0,000159	Durbin-Watson	1,221798

'Between' variance = 0,351136
'Within' variance = 0,532362
theta used for quasi-demeaning = 0,51764
corr(y,yhat)^2=0,106385

Joint test on named regressors -
Asymptotic test statistic: Chi-square(6) = 8,34668
with p-value = 0,213789

Breusch-Pagan test -
Null hypothesis: Variance of the unit-specific error = 0
Asymptotic test statistic: Chi-square(1) = 28,8318
with p-value = 7,8945e-008

Hausman test -
Null hypothesis: GLS estimates are consistent
Asymptotic test statistic: Chi-square(6) = 7,00978
with p-value = 0,319944



Frequency distribution for uhat3, obs 1-140
number of bins = 11, mean = -1,44091e-014, sd = 0,922681

interval	midpt	frequency	rel.	cum.	
< -0,69932	-1,0883	14	10,00%	10,00%	***
-0,69932 - 0,078734	-0,31029	84	60,00%	70,00%	**********
0,078734 - 0,85679	0,46776	28	20,00%	90,00%	*******
0,85679 - 1,6348	1,2458	7	5,00%	95,00%	*
1,6348 - 2,4129	2,0239	4	2,86%	97,86%	*
2,4129 - 3,1910	2,8019	1	0,71%	98,57%	
3,1910 - 3,9690	3,5800	1	0,71%	99,29%	
3,9690 - 4,7471	4,3580	0	0,00%	99,29%	
4,7471 - 5,5251	5,1361	0	0,00%	99,29%	
5,5251 - 6,3032	5,9141	0	0,00%	99,29%	
>= 6,3032	6,6922	1	0,71%	100,00%	

Test for null hypothesis of normal distribution:
Chi-square(2) = 297,586 with p-value 0,00000

DURBIN-WATSON

Durbin-Watson statistic = 1,2218
p-value = 4,63863e-006