ANNEX - I

Questionnaire

Dear Sir/Madam,

This is to bring your kind information that this is an attempt to identify the root Determinants of Share Price of Nepalese Commercial Banks listed in NEPSE for the partial fulfillment of Thesis required for MBS degree, TU. you are kindly requested to fill up the following questionnaire with the best answer in your view. I would be grateful to you for the contribution of your valuable time and effort.

Please note that all the questions are related to the a study on share price behavior 0f Nepalese capital market

Name : _____ Sex : M [ ] F [ ] Age : _____

Occupation (Tick One):

- ☐ Professional Investor
- ☐ Potential Investor
- ☐ Market Analyzer
- ☐ Others (Specify)

Academic Qualification (tick appropriate):

- ☐ Under SLC
- ☐ Higher Secondary
- ☐ Graduate
- ☐ Post Graduate

Questions:

Please Tick the best alternative (QN 1-4)

1. Which one do you think is major purpose to invest in Company Stocks ?
   - o To earn maximum profit
   - o Safe investment
   - o For capital gain
   - o Help capital mobilization
   - o Others (if any)……
2. It has been observed that the share investors of Nepal are highly attracted in the shares of Commercial Banks for their investment. What do you think is the prime cause of this ?
   - o Continuous Declaration of Dividend
   - o Market Stability
   - o Banks are better controlled/managed
   - o Others……
3. Do you think that Nepalese investor make investment decision after the analysis of relevant indicators?

   Yes [ ] No [ ] Can't Say [ ]

4. In your experience the prevailing laws and policies regarding the buying and selling of shares are perfect?
    - o Yes
    - o No
    - o Don't know

Please indicate with the appropriate letter(s) in the gap to which extent do you agree with the following statements by filling in the blanks provided. ***(QN 5-11)***

SA	for	Strongly Agree
A	for	Agree
U	for	Undecided
D	for	Disagree
SD	for	Strongly Disagree

5. EPS is the main determiner of Share Price because higher EPS indicates higher Share Price……
6. Dividend Pattern plays vital role on the determination of Share Price because higher the DPS, more will be the share price ……
7. Good Company Assets structure indicates higher share price……
8. Better Capital Structure results higher share price ……
9. Political situation also cause the change in share price ……
10. Annual General Meeting and the election of Board of Director influence the share price ……
11. Higher the risk of the company, higher will be the share price……..

Please Rank 1, 2, 3,..., 6. [1 for the best factor]

12. Which of the following do you think affects the share price of the company ?

Earning Per Share [EPS]	
Dividend Pattern (Dividend Per Share]	
Company Assets	
Capital Structure	
Political Situation	
AGM/Election of BOD	

Thank you for your time and effort.

APPENDIX - II

Classification of Respondents of Survey (Q.N. 1-4)

S.N.	Stem	Professional Investor	Potential Investor	Market Analyzer	Total
1	a.	25	9	2	36
		(78)	(60)	(67)	(72)
	b.	2	3	1	6
		(6)	(20)	(33)	(12)
	c.	2	1	0	3
		(6)	(7)	0	(6)
	d.	3	2	0	5
		(9)	(13)	0	(10)
	Total	**32**	**15**	**3**	**50**
		(100)	**(100)**	**(100)**	**(100)**
2	a.	14	4	1	19
		(44)	(27)	(33)	(38)
	b.	2	3	0	5
		(6)	(20)	0	(10)
	c.	16	8	2	26
		(50)	(53)	(67)	(52)
	Total	**32**	**15**	**3**	**50**
		(100)	**(100)**	**(100)**	**(100)**
3	a.	21	7	0	28
		(66)	(47)	0	(56)
	b.	8	5	2	15
		(25)	(33)	(67)	(30)
	c.	3	3	1	7
		(9)	(20)	(33)	(14)
	Total	**32**	**15**	**3**	**50**
		(100)	**(100)**	**(100)**	**(100)**
4	a.	15	7	1	23
		(47)	(47)	(33)	(46)
	b.	7	3	0	10
		(22)	(20)	0	(20)
	c.	10	5	2	17
		(31)	(33)	(67)	(34)
	Total	**32**	**15**	**3**	**50**
		(100)	**(100)**	**(100)**	**(100)**

Note:

a. S.N. refers to Question Number.

b. Stem refers to the options of the answer.

c. The figure in bracket refers to the percentage of respective no. of respondents.

APPENDIX - III

Rank wise No. of Responses of Survey (Q.No. 12)

S.N.	Indicators	Basis	Rank						Total	Weight	Mean Wt.	Overall Rank
			1	2	3	4	5	6				
1	EPS	**Total**	25	18	4	2	0	1	50	87	1.74	1
		Professional Investor	17	13	1	1	0	0	32	50	1.56	1
		Potential Investor	6	4	3	1	0	1	15	33	2.20	2
		Market Analyzer	2	1	0	0	0	0	3	4	1.33	1
2	DPS	**Total**	18	23	7	2	0	0	50	93	1.86	2
		Professional Investor	11	14	5	2	0	0	32	62	1.94	2
		Potential Investor	6	8	1	0	0	0	15	25	1.67	1
		Market Analyzer	1	1	1	0	0	0	3	6	2.00	2
3	Assets	**Total**	0	0	2	4	18	26	50	268	5.36	6
		Professional Investor	0	0	2	2	10	18	32	172	5.38	6
		Potential Investor	0	0	0	2	7	6	15	79	5.27	6
		Market Analyzer	0	0	0	0	1	2	3	17	5.67	6
4	Capital	**Total**	0	3	6	6	21	14	50	237	4.74	5
		Professional Investor	0	2	4	3	15	8	32	151	4.72	5
		Potential Investor	0	1	2	2	6	4	15	70	4.67	5
		Market Analyzer	0	0	0	1	0	2	3	16	5.33	6
5	Political	**Total**	4	5	21	10	6	4	50	171	3.42	3
		Professional Investor	3	3	14	7	4	1	32	105	3.28	3
		Potential Investor	1	1	6	3	2	2	15	55	3.67	4
		Market Analyzer	0	1	1	0	0	1	3	11	3.67	4
6	AGM	**Total**	3	1	10	26	5	5	50	194	3.88	4
		Professional Investor	2	1	6	16	3	4	32	125	3.91	4
		Potential Investor	1	0	4	7	2	1	15	57	3.80	4
		Market Analyzer	0	0	0	3	0	0	3	12	4.00	4

APPENDIX - IV

Calculation of Regression Line of MPS on DPS of BOK

Fiscal DPS	DPS DPS	MPS Y	$x = X-\bar{X}$	$y = Y-\bar{Y}$	x^2	y^2	
2003/04	10	295	-17.022	-765	289.7485	585225	13021
2004/05	15	430	-12.022	-630	144.5285	396900	7573
2005/06	48	850	20.978	-210	440.0765	44100	-4405
2006/07	20	1375	-7.022	315	49.30848	99225	-2211
2007/08	42.11	2350	15.088	1290	227.6477	1664100	19463
Total	**135.11**	**5300**			**1151.31**	**2789550.00**	**33441**

i) Calculation of Mean

	For DPS				For MPS			
Mean	$\bar{X} = \sum X/5$	=	27.02		$\bar{Y} = \sum Y/5$	=	1060	

ii) Calculation of Correlation Coefficient between DPS and MPS

$$r = \frac{\sum xy}{\sqrt{\sum x^2}\sqrt{\sum y^2}} = \frac{33441.9}{56671} = 0.5901$$

iii) Calculation of Standard Deviation (б)

For DPS

$$б_x = \sqrt{\frac{\sum (x-\bar{x})^2}{N}} = \sqrt{\frac{1151.31}{5}} = 15.17$$

For MPS

$$б_y = \sqrt{\frac{\sum (y-\bar{y})^2}{N}} = \sqrt{\frac{27895}{5}} = 746.93$$

iv) Now the regression line of MPS Y on DPS X is given by;

$$Y-\bar{Y} = r \times \frac{б_y}{б_x}(X-\bar{X})$$

$$\text{or, } Y-1060 = 0.59 \times \frac{746.93}{15.17}(X-3)$$

$$\text{or, } Y-1060 = 29.05X - 2276083$$

$$\text{or, } Y = 275.10 + 29.05X$$

Same process has been followed to calculate the regression equation of other banks and other variables.

APPENDIX – V

Calculation of Multiple Regression Equation of MPS on DPS and EPS of BOK

Let MPS, DPS and EPS are denoted by X_1, X_2 and X_3 respectively. Then the multiple regression equation of MPS(X_1) on DPS(X_2) and EPS(X_3) be;

$$X_1 = a_1 + b_1 X_2 + b_2 X_3 \quad \text{..... (i)}$$

The values of constant a_1, b_1 and b_2 can be determined by solving following three normal equations simultaneously.

$$\sum X_1 = na_1 + b_1 \sum X_2 + b_2 \sum X_3 \quad \text{..... (ii)}$$
$$\sum X_1X_2 = a_1 \sum X_2 + b_1 \sum X_2^2 + b_2 \sum X_2X_3 \quad \text{..... (iii)}$$
$$\sum X_1X_3 = a_1 \sum X_3 + b_1 \sum X_2X_3 + b_2 \sum X_3^2 \quad \text{..... (iv)}$$

X_1	X_2	X_3	X_1X_2	X_2X_3	X_3X_1	X_2^2	X_3^2
295	10	27.5	2950	275	8112.5	100	756.25
430	15	30.1	6450	451.5	12943	225	906.01
850	48	43.67	40800	2096.16	37119.5	2304	1907.069
1375	20	43.5	27500	870	59812.5	400	1892.25
2350	42.11	59.94	98958.5	2524.073	140859	1773.252	3592.804
$\sum X_1$ = 5300	**$\sum X_2$ = 135.11**	**$\sum X_3$ = 204.71**	**$\sum X_1X_2$ = 176658.50**	**$\sum X_2X_3$ = 6216.73**	**$\sum X_3X_1$ = 258846.50**	**$\sum X_2^2$ = 4802.25**	**$\sum X_3^2$ = 9054.38**

Substituting the sum values in normal equation, we get

$$5300 = 5\, a_1 + 135.11\, b_1 + 204.71\, b_2 \quad \text{..... (v)}$$
$$\text{or, } 176658.50 = 135.11\, a_1 + 4802.25\, b_1 + 6216.73\, b_2 \quad \text{..... (vi)}$$
$$\text{or, } 258846.50 = 204.71\, a_1 + 6216.73\, b_1 + 9054.38\, b_2 \quad \text{..... (vii)}$$

Multiplying (v) by 135.11 and (vi) by 5 and then subtracting (v) from (vi), we get

$$883292.50 = 675.55\, a_1 + 24011.26\, b_1 + 31083.67\, b_2$$
$$716083.00 = 675.55\, a_1 + 18254.71\, b_1 + 27658.37\, b_2$$
$$\text{or, } 167209.50 = 5756.55\, b_1 + 3425.30\, b_2 \quad \text{..... (viii)}$$

Again multiplying (v) by 204.71 and (vii) by 5 and then subtracting (v) from (vii), we get

$1294232.50 = 1023.55\ a_1 + 31083.67\ b_1 + 45271.91\ b_2$

$1084963.00 = 1023.55\ a_1 + 27658.37\ b_1 + 41906.18\ b_2$

– – – –

or, $209269.50 = 3425.30\ b_1 + 3365.73\ b_2$ ……. (ix)

Again multiplying (viii) by 3425.30 and (ix) by 5756.55 and then subtracting (viii) from (ix), we get,

$1204670005.39 = 19717898.90\ b_1 + 19374978.44\ b_2$

$5727425816.42 = 19717898.90\ b_1 + 11732672.55\ b_2$

– – –

or, $631927488.97 = 7642305.88\ b_2$

or, $b_2 = \frac{631927488.97}{7642305.88}$

$= 82.69$

Substituting the value of b_2 in equation (ix), we get

$209269.50 = 3425.30\ b_1 + 3365.73 \times 82.69$

or, $209269.50 = 3425.30\ b_1 + 278305.57$

or, $-69036.07 = 3425.30\ b_1$

or, $b_1 = \frac{-69036.07}{3425.30}$

$= -20.15$

Again substituting the value of b_1 and b_2 in equation v, we get

$5300 = 5\ a_1 + 135.11 \times -20.15 + 204.71 \times 82.69$

or, $5300 = 5\ a_1 + 14203.96$

or, $-8903.96 = 5\ a_1$

or, $a_1 = \frac{-8903.96}{5}$

$= -1780.79$

Now substituting the values of a_1, b_1 and b_2 in (i), we get multiple regression equation of MPS(X_1) on DPS(X_2) and EPS(X_3);

$X_1 = -1780.79 - 20.15\ X_2 + 82.69\ X_3$

i.e. MPS $= -1780.79 – 20.15$ DPS $+ 82.69$ EPS