



Adversity quotient among UPLB college students

*Rowena N Monte, Aivi R Buan, Jovita S Dela Cruz
University of the Philippines, Los Banos, Philippines

Abstract

Adversity quotient is basically how individuals react and process different changes and challenges brought about by surrounding people whether it is positive or negative condition. This study aims to examine the AQ of selected UPLB students, specifically to perceive: A.) The profile of the respondents with regards to the following variables: a.) Gender, college, course, and year level; b.) The level of AQ according to gender, college, course and year level. Adversity Response Profile (ARP) version 8.1: Student version was the instrument used to know the AQ level of college students from different colleges. It has shown that most of the respondents have above average AQ level. There are no significant differences at .05 with the AQ of male and female among colleges, courses and year level with 0.5170, 0.2159, 0.3412, and 0.6418 respectively.

Keywords: adversity quotient, adversity response profile, university of the Philippines Los, banos

1. Introduction

It has been reported that for many years, researchers have devoted a great deal of their studies to Intelligence Quotient (IQ) and Emotional Quotient (EQ), which are considered to be determinants of success and superior accomplishment. However in 1997, Paul Stoltz introduced a new yet interesting & intriguing concept – Adversity Quotient (AQ), that tells how well one withstands adversity and his ability to triumph over it.

As per research: “Adversity Quotient (AQ) is a measure of how you respond to adversity (change and challenges). It provides the tools for improving how you react and thus overall professional effectiveness.”

The premise of AQ include: a) successful people share the profound urge to strive, make progress, to achieve their goals and fulfill dreams; b) Adversity Quotient is learned: rewire your brain for success and c) It is the difference between pessimism and optimism. Hence, those who respond to adversity optimistically outlive pessimists

It is an established science, theory and approach in becoming more resilient to face life’s challenges.

The implication of the measurement of AQ is simple: the stronger the AQ, the more effectively a person responds to adversity and the less life’s events will take a toll on a person’s energy, performance, health and outlook. However, the weaker the AQ, the more difficult it can be for a person to maintain the energy, optimism, fortitude required to optimize the talents and skills in one’s life. Unlike IQ, AQ can be improved.

In college, students learn about theories and knowledge from their respective field of studies that enable them to acquire the level of preparedness needed for the kind of profession they will deliver in the future. However, this education and experience serve mostly as a support on how to deal with the bigger picture---their own lives. Apparently, learning how to overcome the challenges presented in one’s life is something

that is acquired by a person through the way he or she processes his or her environment mentally, socially, emotionally, physically and spiritually.

For instance, handling rejection, accepting mistakes, managing conflicts, dealing with success, overcoming fear, recognizing strengths and weaknesses, measuring opportunities, taking risks, all these things are as much important to learn by the person himself.

Teachers, colleagues, bosses, family and other significant people surrounding a person can either help make a person or break him, but the bottom line of everything is still, how he or she processes all these things.

The major thrust of this study is to investigate the adversity quotient of selected UPLB students during the second semester 2016-2017.

1.1 Purpose of the Study

This study aims to examine the adversity quotient of selected UPLB students. It specifically conducted to identify the profile of the respondents with regards to the following variables: gender; college; course; and, year level, to determine the level of adversity quotient of the students, and if there is significant difference in the adversity quotient of the students according to: gender; college; course; and year level.

2. Methodology

The respondents of the study were 126 selected UPLB students, forty (40) male and eighty six (86) female from different colleges during second semester 2016-2017. The major instrument used in the assessment of the adversity quotient of the respondents was the Adversity Response Profile (ARP) Version 8.1: Student version. The ARP forms were distributed amongst the respondents upon getting their approval to participate in the study.

3. Results and Discussion

This study looks into the AQ or adversity quotient of selected college students during the second semester 2016-2017. Table 1 below shows the distribution of the respondents according to gender, college, course and year level. It can be seen that there are more female respondents (86) than male respondents (40). Also, out of the eight colleges, the College of Arts and Sciences has the most number of respondents (30) while the College of Forestry and Natural Resources has the least number of respondents (6). Moreover, the courses BS Agricultural and Bio systems Engineering and Pre Veterinarian Medicine have the most number of respondents (16) while the courses BA Philosophy, BS Applied Math, BS Chemistry and BS Math and Science Teaching have the least

number of respondents (1). Lastly, most of the respondents are 1st year college students (73) and only five (5) respondents are 4th year college students.

The demographic profile is important as it may indicate an effect to the result of the adversity quotient of the students belonging in a particular course, age range and gender. For instance, the difficulty of the course as perceived by the student may be the same perception of difficulty that these students may have on the kind of profession they will venture in after college. It likewise tells something about how they regard the present challenges given to them. Meanwhile, their age range may suggest the level of maturity they have in terms of understanding the circumstances presented to them.

Table 1: Frequency and Percentile Distribution of Respondents According to Gender, College, Course and Year Level

Variables		Frequency	Percent	Variables		Frequency	Percent
Gender	Female	86	68.25	Course	BS BIO	2	1.59
	Male	40	31.75		BS CE	5	3.97
	Total	126	100		BS CHEM	1	0.79
College	CA	10	7.94		BS CS	6	4.76
	CAS	30	23.81		BS DEVCOM	9	7.14
	CDC	9	7.14		BS ECON	7	5.56
	CEAT	26	20.63		BS EE	2	1.59
	CEM	19	15.08		BS F	6	4.76
	CFNR	6	4.76		BS FT	2	1.59
	CHE	10	7.94		BS HE	7	5.56
	CVM	16	12.7		BS IE	3	2.38
	Total	126	100		BS MATH	2	1.59
	Course	BA CA	4		3.17	BS MST	1
BA PHILO		1	0.79		BS N	3	2.38
BA SOC		2	1.59		BS STAT	7	5.56
BS A		5	3.97		PRE VET	16	12.7
BS ABE		16	12.7	Total	126	100	
BS ABM		3	2.38	Year	1st	73	57.94
BS ABT		3	2.38		2nd	35	27.78
BS AECO		9	7.14		3rd	13	10.32
BS AM		1	0.79		4th	5	3.97
BS AP		3	2.38		Total	126	100

Growing researches have shown recently that the measurement of “AQ is a better index in achieving success than IQ, education or even social skills.”

Table 2: Distribution of Respondents According to AQ Level

Adversity Quotient Level	Frequency	Percent
Above Average	55	43.65
Average	39	30.95
Below Average	26	20.63
High	5	3.97
Low	1	0.79
Total	126	100

Table 2 above shows the distribution of respondents according to adversity quotient level. It can be seen on, that most of the respondents have above average adversity quotient level accounting for 43.65% of the 126 respondents. On the other hand, only 0.79% of 126 respondents have low adversity

quotient level.

Test on Normality

Table 3: Test on normality using Shapiro – Wilk Test.

Variable	N	Test Statistic (W)	p-value
Adversity Quotient	126	0.9439	0.00005

*At alpha = 5%, the data is not normal

Table 3 shows the result of the Shapiro-Wilk test. The Shapiro-Wilk test was utilized to test if the data is normal. Based on the results, at alpha = 5%, the data is not normal with 0.00005 as p-value. Thus, instead of using parametric tests we should use non-parametric tests. A non-parametric test using wilcoxon rank-sum test is then utilized as shown result below:

Wilcoxon Rank-Sum Test (Non parametric analog of independent two sample t-test)

Table 4: Two - sample Wilcoxon Rank-Sum Test on Adversity Quotient of the two Sexes with its p-value.

Gender	Obs	Rank Sum	Expected	p-value
Female	86	5584.5	5461	0.5170
Male	40	2416.5	2540	
Combined	126	8001	8001	

*At alpha = 5%, the AQ of male and female is not significantly different.

Table 4 shows the result of Wilcoxon Rank-Sum Test. The Wilcoxon Rank-Sum Test is the non-parametric counterpart of independent two sample t test. Based on the result, at alpha = 5%, the adversity quotient of male and female is not significantly different with p-value equals 0.5170.

Kruskal-Wallis Test (Non parametric analog of One Way ANOVA)

Table 5: Kruskal-Wallis equality-of-populations rank test on Adversity Quotient among Colleges.

College	Obs	Rank Sum	Test Statistic (chi-square)	p-value
CA	10	536.5	9.544	0.2159
CAS	30	1817.5		
CDC	9	582.5		
CEAT	26	1983		
CEM	19	1218.5		
CFNR	6	174		
CHE	10	639.5		
CVM	16	1049.5		

*At alpha = 5%, there is no difference in the AQ among colleges.

Table 5 shows the result of the Kruskal-Wallis equality-of-populations rank test on AQ among colleges. The Kruskal-Wallis test is the non-parametric counterpart of the One Way ANOVA. Based on the results, at alpha = 5%, there is no significant difference in the mean ranks of adversity quotient among different colleges with p-value equal to 0.2159.

This implies that the college students have the same difficulty/level of ease as perceived by the students. This may be because they see their studies as a part of their lives that must be passed towards the end of the course. The activities or type of measurement of their learning's may also be similar across these colleges that contributed to the almost unifying perception of the respondents hence, there was no significant difference of ranks of AQ. Colleges normally have similarities in feature especially with the kind of background the courses under these colleges have. For instance, arts related courses under the college of arts have most likely similar subjects and similar activities which the student-respondents participate in. The professors may also be similarly handling two or more subjects under different courses in a specific college. This adds to the level of perception on adversity that the students may build.

Table 6: Kruskal-Wallis equality-of-populations rank test of Adversity Quotient by Course.

Course	Obs	Rank Sum
BA Philosophy	1	22.5
BS Agricultural Biotechnology	3	174
BS Agricultural Business Management	3	230.5
BS Agricultural Economics	9	555
BS Agricultural and Biosystems Engineering	16	1234
BS Agriculture	5	294.5
BS Applied Math	1	102
BS Applied Physics	3	211
BS Biology	2	51
BS Chemistry	1	126
BS Civil Engineering	5	473.5
BS Communication Arts	4	213.5
BS Computer Science	6	366
BS Development Communication	9	582.5
BS Economics	7	433
BS Electrical Engineering	2	58.5
BS Food Technology	2	68
BS Forestry	6	174
BS Human Ecology	7	456
BS Industrial Engineering	3	217
BS Mathematics	2	42.5
BS Mathematics and Science Teaching	1	59
BS Nutrition	3	183.5
BS Sociology	2	87.5
BS Statistics	7	536.5
Pre Veterinarian Medicine	16	1049.5

Test Statistic (chi-square) = 27.2980 p-value = 0.3412

*At alpha = 5%, there is no significant difference in the AQ among different courses.

Table 6 shows the result of the Kruskal-Wallis equality-of-populations rank test on AQ among courses. Based on the results, at alpha=5%, there is no significant difference in the mean ranks of adversity quotient among different courses with p-value equal to 0.3412. Similar to the results per college, the courses do not differ

significantly as the means of learning may probably be the same in terms of the structure. For instance, (long quiz week, exam days, finals week) and the like which all have similarities that may be deemed very much alike towards each other.

Table 7: Kruskal-Wallis equality-of-populations rank test of Adversity Quotient by Year level.

Year	Obs	Rank Sum	Test Statistics (chi-square)	p-value
1st	73	4488	1.678	0.6418
2nd	35	2186		
3rd	13	966		
4th	5	361		

*At alpha = 5%, there is no difference in the AQ among year level.

Table 7 shows the result of the Kruskal-Wallis equality-of-populations rank test on AQ among year level. Based on the results, at alpha = 5%, there is no significant difference in the mean ranks of adversity quotient among year level with p-value equal to 0.6418. Meanwhile, per year level looks into

the age range maturity and readiness of the students relevant to their adversity quotient. It was noted that the year level has no significant difference. This implies that their age range may have the same level of maturity when it comes in looking at the general challenges of life as student.

Table 8: Age, gender, college, course, year, adversity quotient (AQ) and adversity quotient (AQ) level of the respondents.

Respondent No.	Age	Gender	College	Course	Year	AQ	AQ Level
1	20	M	CA	BS Economics	1st	67	A
2	17	M	CA	BS Economics	1st	69	BA
3	17	M	CA	BS Agricultural Economics	1st	67	AA
4	18	M	CAS	Pre Veterinarian Medicine	3rd	63	A
5	17	M	CAS	Pre Veterinarian Medicine	1st	73	A
6	17	M	CAS	Pre Veterinarian Medicine	4th	72	AA
7	17	M	CAS	Pre Veterinarian Medicine	2nd	63	AA
8	19	M	CAS	Pre Veterinarian Medicine	2nd	40	AA
9	18	M	CAS	Pre Veterinarian Medicine	2nd	56	AA
10	17	M	CAS	Pre Veterinarian Medicine	1st	69	AA
11	20	M	CAS	Pre Veterinarian Medicine	1st	61	BA
12	19	M	CAS	Pre Veterinarian Medicine	2nd	72	BA
13	17	M	CAS	Pre Veterinarian Medicine	2nd	74	A
14	18	M	CAS	Pre Veterinarian Medicine	2nd	66	H
15	18	M	CAS	Pre Veterinarian Medicine	1st	66	AA
16	16	M	CAS	BS Nutrition	1st	60	AA
17	18	M	CAS	BS Human Ecology	2nd	59	BA
18	16	M	CEAT	BS Human Ecology	1st	73	BA
19	17	M	CEAT	BS Nutrition	1st	65	AA
20	20	M	CEAT	BS Human Ecology	1st	71	AA
21	18	M	CEAT	BS Human Ecology	1st	52	BA
22	16	M	CEAT	BS Human Ecology	1st	65	AA
23	17	M	CEAT	BS Human Ecology	1st	65	H
24	18	M	CEAT	BS Human Ecology	1st	80	A
25	18	M	CEAT	BS Nutrition	1st	73	BA
26	17	M	CEAT	BS Forestry	2nd	71	A
27	21	M	CEAT	BS Forestry	1st	70	BA
28	18	M	CEAT	BS Forestry	1st	62	A
29	17	M	CEAT	BS Forestry	2nd	75	AA
30	18	M	CEAT	BS Forestry	1st	71	BA
31	17	M	CEM	BS Agricultural Economics	2nd	60	AA
32	18	M	CEM	BS Agricultural Business Management	1st	76	AA
33	16	M	CEM	BS ECONOMICS	1st	62	A
34	16	M	CEM	BS ECONOMICS	3rd	78	AA
35	18	M	CEM	BS Agricultural Economics	1st	63	A
36	16	M	CFNR	BS Agricultural Economics	1st	26	A
37	16	M	CVM	BS Agricultural Economics	1st	66	H
38	16	M	CVM	BS Agricultural Economics	1st	72	BA

39	17	M	CVM	BS ECONOMICS	1st	52	AA
40	18	M	CVM	BS ECONOMICS	1st	65	AA
41	17	F	CA	BS Agricultural Economics	1st	62	A
42	17	F	CA	BS Agricultural and Biosystems Engineering	1st	73	AA
43	18	F	CA	BS Agricultural and Biosystems Engineering	1st	66	AA
44	17	F	CA	BS Agricultural and Biosystems Engineering	1st	50	A
45	18	F	CA	BS Industrial Engineering	1st	79	AA
46	17	F	CA	BS Agricultural and Biosystems Engineering	1st	57	AA
47	20	F	CA	BS Civil Engineering	3rd	56	AA
48	17	F	CAS	BS Industrial Engineering	1st	77	A
49	17	F	CAS	BS Industrial Engineering	4th	57	AA
50	17	F	CAS	BS Agricultural and Biosystems Engineering	1st	72	A
51	17	F	CAS	BS Agricultural and Biosystems Engineering	1st	65	AA
52	16	F	CAS	BS Agricultural and Biosystems Engineering	2nd	69	A
53	18	F	CAS	BS Agricultural and Biosystems Engineering	1st	74	H
54	17	F	CAS	BS Agricultural and Biosystems Engineering	1st	74	A
55	18	F	CAS	BS Development Communication	3rd	77	AA
56	17	F	CAS	BS Development Communication	1st	63	A
57	17	F	CAS	BS Development Communication	3rd	55	AA
58	16	F	CAS	BS Development Communication	1st	100	AA
59	18	F	CAS	BS Development Communication	1st	58	AA
60	17	F	CAS	BS Development Communication	3rd	64	AA
61	17	F	CAS	BS Development Communication	2nd	67	A
62	17	F	CAS	BS Development Communication	1st	71	BA
63	17	F	CAS	BS Development Communication	1st	62	BA
64	16	F	CDC	BS Communication Arts	2nd	55	A
65	16	F	CDC	BS Statistics	2nd	60	AA
66	18	F	CDC	BS Statistics	2nd	62	A
67	19	F	CDC	BS Statistics	2nd	68	A
68	16	F	CDC	BS Communication Arts	2nd	77	BA
69	17	F	CDC	BS Chemistry	1st	76	H
70	20	F	CDC	BS Statistics	1st	69	BA
71	16	F	CDC	BS Mathematics	1st	63	A
72	19	F	CDC	BS Statistics	3rd	76	AA
73	16	F	CEAT	BS Statistics	1st	65	AA
74	17	F	CEAT	BS Applied Math	2nd	98	AA
75	18	F	CEAT	BS Sociology	1st	65	AA
76	17	F	CEAT	BS Computer Science	1st	82	A
77	16	F	CEAT	BS Communication Arts	1st	65	AA
78	20	F	CEAT	BS Sociology	1st	73	BA
79	18	F	CEAT	BS Statistics	2nd	65	AA
80	18	F	CEAT	BS Agriculture	4th	76	BA
81	17	F	CEAT	BS Agricultural Biotechnology	1st	70	BA
82	16	F	CEAT	BS Agriculture	2nd	68	AA
83	17	F	CEAT	BS Food Technology	2nd	64	BA
84	17	F	CEAT	BS Agriculture	2nd	69	A
85	17	F	CEAT	BS Agricultural Biotechnology	1st	75	AA
86	17	F	CEM	BS Agriculture	1st	63	A
87	17	F	CEM	Pre Veterinarian Medicine	1st	70	A
88	16	F	CEM	Pre Veterinarian Medicine	1st	74	BA
89	17	F	CEM	Pre Veterinarian Medicine	1st	50	AA
90	17	F	CEM	Pre Veterinarian Medicine	1st	86	A
91	17	F	CEM	BS Forestry	1st	62	L
92	17	F	CEM	BS Agricultural Business Management	3rd	62	A
93	20	F	CEM	BS Agricultural Economics	1st	76	AA
94	17	F	CEM	BS Agricultural Economics	1st	62	A
95	17	F	CEM	BS Agricultural Business Management	1st	70	AA
96	19	F	CEM	BS ECONOMICS	1st	75	BA
97	17	F	CFNR	BS Civil Engineering	3rd	60	AA
98	17	F	CFNR	BS Agricultural and Biosystems Engineering	1st	69	AA
99	16	F	CFNR	BS Agricultural and Biosystems Engineering	2nd	63	A
100	16	F	CFNR	BS Agricultural and Biosystems Engineering	4th	50	AA
101	18	F	CFNR	BS Agricultural and Biosystems Engineering	1st	62	AA

102	17	F	CHE	BS Civil Engineering	2nd	57	AA
103	17	F	CHE	BS Agricultural and Biosystems Engineering	2nd	67	AA
104	17	F	CHE	BS Agricultural and Biosystems Engineering	1st	96	A
105	17	F	CHE	BS Agricultural and Biosystems Engineering	1st	77	A
106	17	F	CHE	BS Electrical Engineering	2nd	58	BA
107	16	F	CHE	BS Civil Engineering	3rd	72	AA
108	16	F	CHE	BS Electrical Engineering	2nd	71	A
109	17	F	CHE	BS Civil Engineering	1st	60	AA
110	19	F	CHE	BS Applied Physics	1st	60	BA
111	16	F	CHE	BA Philosophy	1st	71	BA
112	17	F	CVM	BS Mathematics and Science Teaching	2nd	73	A
113	17	F	CVM	BS Computer Science	2nd	88	A
114	16	F	CVM	BS Applied Physics	1st	66	AA
115	17	F	CVM	BS Computer Science	3rd	57	AA
116	17	F	CVM	BS Computer Science	3rd	60	BA
117	17	F	CVM	BS Communication Arts	1st	68	AA
118	17	F	CVM	BS Biology	2nd	74	BA
119	17	F	CVM	BS Mathematics	3rd	71	BA
120	17	F	CVM	BS Biology	2nd	69	A
121	20	F	CVM	BS Applied Physics	2nd	76	AA
122	16	F	CVM	BS Computer Science	2nd	63	AA
123	18	F	CVM	BS Computer Science	2nd	64	A
124	17	F	CEM	BS Agricultural Biotechnology	2nd	68	A
125	17	F	CEM	BS Agriculture	1st	60	AA
126	17	F	CEM	BS Food Technology	4th	67	A

**H	-	High (84 - 100)
AA	-	Above Average (68 - 83)
A	-	Average (52 - 67)
BA	-	Below Average (36 - 51)
L	-	Low (20 - 35)

Dr. Paul Stoltz defines Adversity Quotient as “the capacity of the person to deal with the adversities of his life. As such, it is the science of human resilience.” In this study, the student’s life focusing on their academics and extra-curricular activities that come with it are given focus. It can be noticed that there are only 5 groups that got the HIGH adversity quotient level amongst the total respondents that participated in the study. Chemistry, Agriculture and Biosystems Engineering, Agricultural Economics, Pre-Veterinarian Medicine and Human ecology courses. Most of them are in the first year level as well except for veterinary medicine that are in the second level. The explanation is maybe due to their young and optimistic outlook as well as excitement toward their courses. They may be taking up general education courses more than the major subjects hence they are taking things “easy” compared to other senior year levels. Meanwhile, first year female BS Forestry students got a Low AQ. The rest have significant Above Average, Average and Below Average AQ which are present across different year levels and courses as well as colleges.

4. Summary and Recommendations

According to the Adversity Quotient, individuals can alter their successes by changing their habits of thought. It is then recommended to individuals that have weak AQ and those who are on the average to execute techniques for overcoming low AQ. The following are the suggestions: First, Listen to your thought responses (are they high or low AQ?), Second, Explore all origins and ownership of the result: here one may ask the following questions: What are the possible origins of

the adversity? What part was my fault? What specifically could I have done better? What aspects should I own? What aspects shouldn’t I own?

Third, Analyze the evidence. Asking these questions can help analyze the evidence: What evidence is there that I have no control? What evidence is there that the adversity will affect the other areas of my life? What other evidence is there that there will be prolonged consequences?

Lastly, Do Something: by asking the following an individual can potentially overcome the obstacles that may be needed in doing something: What additional information do I need? What could I do to gain some control? What could I do to limit the reach of the adversity? What could I do to limit how long the adversity endures in its current state?

Another suggestion was to “create a visual image of a silly gesture and a silly sound (make it loud and powerful).” Wherein each time adversity strikes, an individual may think of this image and sound as it alerts him/her to analyze the situation and react appropriately.

Individuals in organizations experience a great deal of struggle on their self-perceptions including their own capabilities and skills especially when they are mixed in an organization with different kinds of people having different attitudes, behaviors and experiences as well as judgments that can potentially affect the way individuals look at their lives. Some important notes and implications needed to be considered for AQ in organizations include a) AQ is present in companies as the company culture. High AQ companies outperform low AQ ones b) The CEO’s personality as one of the influencing factors on the company’s AQ c) Hire staff

with high AQ.

This is especially true as organizations would like to invest more on people who can cope with life's struggles. Published online, it was shared that "for organizations, leaders, and individuals, AQ is the bedrock of human endeavor. Enhance AQ for real gains in productivity, capacity, performance, innovation, morale... and more.

(http://www.peaklearning.com/about_aq.php).

Hence even in Harvard Business School incorporates AQ theory and methods into its prestigious executive development and MBA programs making it possible for AQ to have a research base of over 1500 studies from universities and organizations all over the world.

Other studies provided definition of AQ as the "most scientifically robust and widely used method in the world for measuring and strengthening human resilience."

AQ is utilized by top leaders, industry-leading companies, and governments, AQ is expected to help better the people in an organization through the following areas: Performance, Productivity, Innovation, Agility, Change, Pace, Problem solving, Optimism, Engagement, Morale, Retention, Energy, Hiring, Development, Coaching, Leadership, Culture (http://www.peaklearning.com/about_aq.php).

5. References

1. American Psychological Association. APA dictionary of psychology, 2007.
2. Haller, Howard Edward n. d. Global Resilience Project. Retrieved from http://peaklearning.com/grp_research.html, 2016.
3. Johnson, Monica Brannon n. d. Global Resilience Project. Retrieved from http://peaklearning.com/grp_research.html, 2016.
4. <http://stitchestm.blogspot.com/2007/09/adversity-quotient-aq-emerging.html>
5. <http://www.adversityadvantage.com/stoltz.html>
6. http://www.peaklearning.com/about_aq.php
7. Lazaro-Capones, Antonette R. n. d. Global Resilience Project. Retrieved from http://peaklearning.com/grp_research.html, 2016.
8. PEAK Learning n. d. MP Water Resources: AQ and Performance. Retrieved from www.peaklearning.com, 2016.
9. Stoltz Paul G. Adversity Quotient: Turning obstacles into opportunities. Canada: John Willey and Sons, Inc, 1997.
10. Stoltz Paul G. Adversity quotient at work: Make everyday challenge the key to your success- putting principles of AQ into action. N.Y.: HarperCollins Publishing, Inc, 2000.