# DETERMINING FACTORS OF FINANCIAL LITERACY AMONG SETTLERS IN FELDA BUKIT TANGGA, KEDAH

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# DETERMINING FACTORS OF FINANCIAL LITERACY AMONG SETTLERS IN FELDA BUKIT TANGGA, KEDAH

# By

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### **ABSTRACT**

The purpose of this study is to determine the level of personal financial literacy among the settlers of FELDA Bukit Tangga, Kedah. It also examines the factors that determine the level of personal financial literacy level among the FELDA settlers. A personal financial literacy test was developed and it comprises of 10 questions pertaining to various basic personal finance areas such as time value of money, risk and return, investment and inflation. In addition, a questionnaire consisting of 20 items was developed to examine the determinants of personal financial literacy level. This questionnaire contains several personal finance aspects, namely, parental factor, credit management, savings, investment, retirement planning, education, gender, age, income, and years of working. The average score of the financial literacy test for the FELDA sample is only 45.6%. Generally, the respondents scored badly on questions pertaining to inflation, risk and return, stocks and bonds, diversification and time value of money. The findings of the study revealed that generally the most significant problems faced by the FELDA Bukit Tangga settlers are that their education level is low, low and inconsistent income, limited scope of working experience and relatively low level of financial literacy. In the regression analysis findings, two variables that are found to be significant in determining the financial literacy level is credit management behaviour (CREDIT) and investment behaviour (INVEST). The findings have particularly implicated to the FELDA management and other relevant agencies that they can objectively assess the FELDA settlers' personal financial level as well as develop specific training programmes for them.

**Keywords**: personal finance, financial literacy, FELDA, retirement planning

### **ABSTRAK**

Tujuan kajian ini adalah untuk mengukur tahap celik kewangan peribadi dalam kalangan para peneroka FELDA Bukit Tangga, Kedah. Kajian ini turut mengkaji faktor-faktor yang mempengaruhi tahap kecelikan kewangan peribadi dalam kalangan peneroka FELDA. Satu ujian celik kewangan peribadi telah dibina dan ia terdiri daripada 10 soalan yang merangkumi pengetahuan asas tentang kewangan peribadi seperti nilai masa wang, risiko dan pulangan, pelaburan serta inflasi. Selain itu, satu soal selidik lain turut dijalankan yang merangkumi 20 item bagi mengenal pasti faktor penentu kepada tahap celik kewangan peribadi. Soal selidik ini mengandungi beberapa aspek iaitu; faktor ibu bapa, pengurusan kredit, simpanan, pelaburan, perancangan persaraan, pendidikan, jantina, umur, pendapatan dan pengalaman bekerja. Purata markah bagi ujian celik kewangan bagi sampel peneroka FELDA adalah sebanyak 45.6%. Secara amnya, sebahagian besar daripada responden gagal menjawab dengan baik soalan-soalan tentang inflasi, risiko dan pulangan, saham dan bon, pelaburan dan Secara umumnya, dapatan kajian menunjukkan masalah utama yang dihadapi oleh para peneroka FELDA Bukit Tangga, Kedah adalah tahap pendidikan yang sangat rendah, pendapatan yang tidak mencukupi dan tidak menentu, skop dan bidang kerja yang amat terhad serta tahap kecelikan kewangan yang sangat rendah. Dapatan daripada analisis regrasi pula menunjukkan dua pembolehubah adalah signifikan dalam menentukan tahap celik kewangan peneroka FELDA iaitu pembolehubah pengurusan kredit (CREDIT) dan pembolehubah pengurusan pelaburan (INVEST). Dapatan kajian ini mempunyai implikasi terutamanya kepada pengurusan FELDA dan agensi berkaitan yang mana mereka boleh menilai tahap kewangan peribadi para peneroka serta boleh membangunkan program latihan khusus untuk para peneroka FELDA.

Kata kunci: kewangan peribadi, kecelikan kewangan, FELDA, perancangan persaraan

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# LIST OF ABBREVIATIONS

FELCRA Federal Land Consolidation and Rehabilitation Authority

FELDA Federal Land Development Authority

FESSB Felda Engineering Services Sdn. Bhd.

FGVH Felda Global Ventures Holdings

GDP Gross Domestic Product

GNP Gross National Product

ICT Information Communication Technology

KEJORA Southeast Johor Development Authority

MADA Muda Agricultural Development Authority

RISDA Rubber Industry Smallholder's Authority

SPSS Statistical Package for the Social Sciences

UDA Urban Development Authority

U.S United States of America

UUM University Utara Malaysia

UUMKL University Utara Malaysia Kuala Lumpur

## **CHAPTER ONE**

## INTRODUCTION

# 1.1 Background of the Study

As Malaysia is moving towards achieving a developed nation status by the year 2020, the government has put a lot of effort to raise the level of income of its population. The current Prime Minister also is instrumental in elevating Malaysians' Gross Domestic Product (GDP) per capital level to that of a developed country. This is evidenced by the introduction of the National Transformation Program (NTP) specifically aimed to increase the income level of Malaysians. The main agenda of this program is to strengthen the key economic areas of the country so that the GDP per capita of Malaysians will increase to that of developed countries by the year 2020. However, in so doing, the government is also serious in raising the income level of the poor and those who live in rural areas. Several programmes have been established to specifically help increase the income of poor rural population through agricultural activities. To date, one particular program or mechanism which has been in existence for more than half of a century is the Federal Land Development Authority (more commonly referred to as FELDA) program.

FELDA is a Malaysian government agency that was initially founded to handle the resettlement of rural poor Bumiputera population by relocating them to various newly developed areas turned into farms for growing cash crops. FELDA was established on 1<sup>st</sup> July 1956 under the Land Development Ordinance 1956 and allocated under the Act Amendment 1991. Its functions are as follows:

To carry out and implement development projects.

# The contents of the thesis is for internal user only

## **REFERENCES**

- Agarwal, S., Driscoll, J. C., Gabaix, X., and Laibson, D. (2007). "The Age of Reason: Financial Decisions over the Lifecycle," mimeo, Harvard University.
- Agarwal, S., John C. Driscoll, Gabaix, X., and Laibson, D. (2009a). "The Age of Reason: Financial Decisions over the Life-Cycle with Implications for Regulation." Brookings Papers on Economic Activity.
- Agnew, J. R., and Szykman, L. R. (2005). "Asset Allocation and Information Overload: The Influence of Information Displays," *Journal of Behavioral Finance*, 6(2): 57-70.
- Ahmad Sharifuddin, A. G. (1992). Pencapaian Felda Dalam Meninggikan Taraf
  Sosio Ekonomi Peneroka-peneroka di Skim Rancangan Felda. Tesis,
  Universiti Teknologi Mara, Shah Alam.
- Ahmad Rashid, R. & Ramlan, A.W. (2011). Usaha-usaha Pemilihan Kerjaya di Kalangan Remaja Melayu di Felda Daerah Jerantut, Pahang. http://eprints.utm.my/12037/1/Usaha.pdf
- Alessie, R., Lusardi, A., and Rooij, M. V. (2007). *Financial Literacy and Stock Market Participation*. NBER Working Paper 13565. National Bureau of Economic Research. 1050 Massachusetts Avenue, Cambridge, MA 02138.

- American Institute of Certified Public Accountants. (2003). *Financial Literacy* 101. 360 Degree of Financial Literacy.
- Avard, S., Manton, E., English, D., & Walker, J. (2005, June). The Financial Knowledge of College Freshmen. *College Student Journal*, 321-339.
- Azizi, Y. & Narinder Kaur, P. S. (2002). The Relationship Between Dimensions of Personality, Self-concept and Family Influence on Students in the FELDA Scheme. Presented at the "International Conference on the Challenge on Learning and Teaching in Brave New World". Hatyai City College Thailand and School of Cognitive and Education, Universiti Utara Malaysia, 14-16.
- Bahijah, M. H., Adilah, A. H., Mat Saat, A., Rohana, A. & Sarina, M. N. (2009).
  Socio Economic Issues Among Felda Settlers in Perlis. *Asian Culture and History*, 1(2), 113-117.
- Bateman, H., Eckert, C., Geweke, L., Louviere, J., Satchell, S.,& Thorp, S. (2011). "Financial Competence, Risk Presentation and Retirement Portfolio Preferences." Center for the Study of Choice. Working Paper Series No. 11-003.
- Behrman, J., Mitchell, O. S., Soo, C., and Bravo, D. (2010b). Financial Literacy, Schooling, and Wealth Accumulation. *National Bureau of Economic Research*, 16452.

- Bernheim, D. (1995). Do Households Appreciate their Financial Vulnerabilities?

  An analysis of Actions, Perceptions, and Public Policy. Tax Policy and Economic Growth, Washington, DC: American Council for Capital Formation, 1-30.
- Bernheim, D., Garrett, D., & Maki, D. (2001). Education and Saving: The Longterm Effects of High School Financial Curriculum Mandates. *Journal of Public Economics*, 80, 435-565.
- Borden, L. M., Lee, S. A., Serido, J., & Collins, D. (2008). Changing college students' financial knowledge, at-titudes, and behavior through seminar participation. *Journal of Family Economic* Issues, 29(1), 23-40.
- Brown, K. A. (2009). Examining the Influence of Financial Literacy Education on Financial Decision-making Among Graduate Level Health Professions Students. (Doctoral dissertation, Capella University, Minneapolis, MN)
- Capuano, R., & Ramsey, I. (2011). What Causes Suboptimal Financial Behaviour? An Exploration of Financial Literacy, Social Influences and Behavioural Economics. Research Report of Financial Literacy Project. Published in Melbourne by the Centre for Corporate Law and Securities Regulation, The University of Melbourne. ISBN.

- Chatterjee, S., & Zahirovic Herbert, V. (2010). Retirement planning of younger baby boomers: Who wants financial advice? *Financial Decisions*, 22 (2).
- Chen, H. & Volpe, R. P. (1998). An Analysis of Personal Financial Literacy among College Students. *Financial Services Review*, 7 (2), 107-128.
- Chen, H. & Volpe, R. P. (2002). Gender differences in personal financial literacy among college students. *Financial Services Review*, 11, 289-307.
- Citi (2008). Citibank Introduces Citi Fin-Q to Malaysians Citigroup.com.

  Retrieved from http://www.citi.com/citigroup/press/2008/080205e.htm
- Clark, R. L., D'ambrosio, M. B., McDermed, A. A., & Sawant, K. (2006).

  Retirement Plans and Saving Decisions: The role of information and education. *Journal of Pension Economics and Finance*, 5(1), 45-68.
- Collins, J. M. (2010). A Review of Financial Advice Models and the Take Up of Financial Advice. Working Paper. WP 10. Center for Financial Security WP 10-5. University of Wisconsin, Madison.
- Cory, S. N. & Pickard, A. D. (2008). 2 + 2 = ? It's time for Americans to Become More Financially Literate, and Accountants Can Help Them Do So. *Strategic Finance*, 89(11), 49-52.
- Crow, G., Gerrans, P., & Speelman, C. (2010, December). The role and relevance of domain knowledge, perceptions of planning importance, and risk tolerance

- in predicting savings intentions. *Journal of Economic Psychology*, *31*, 860-871. doi:10.1016/j.joep.2010.06.002
- Danes, S. M., & Hira, T. K. (1987). Money Management Knowledge of College Student, *The Journal of Financial Aid*, 17:1 (Winter), 4-16.
- Delafrooz, N., & Paim, L. (2011). Determinants of Saving Behaviour and Financial Problem Among Employees in Malaysia. *Australian Journal of Basic and Applied Sciences*. 222 228.
- Dusek, H., & Furlong, R. (2010). Fox Cities Financial Literacy Study A Snapshot of a Community: Attitudes, Behaviors, and Knowledge. United Stated Department of Agriculture, Outgamie County Cooperating, University of Winconsin.
- Eric, G. (2012). Using Factor Analysis and Cronbach's Alpha to Ascertain Relationships Between Questions of a Dietary Behavior Questionnaire.

  Mathematica Policy Research, 600 Alexander Park, Princeton, NJ, 08543.
- Folk, J. Y., Beh, L. S., & Diana-Lea, B. (2012). Financial Literacy Key to Retirement Planning in Malaysia. *Journal of Management and Sustainability*. Published by Canadian Center of Science and Education. ISSN 1925-4725 E-ISSN 1925-4733.
- Gan, H. (2008, June). Financial Planning As A Profession. Financial 1st, 22-23.

- Garman, E. T., & Forgue, R. E. (2000). *Personal Finance (6th edition.)*. Boston: Houghton Mifflin.
- González, K. C. C. (2013). Financial Literacy and Retirement Planning: Evidence from Puerto Rico, University of Puerto Rico. *Global Journal of Business Research*, (8), 1-87.
- Greenspan, A. (2001). *The Importance of Financial Education and Literacy*. US

  Federal Reserve System or National Council Of Economic Education,

  Chicago. Bank for International Settlement.
- Greenspan, A. (2003). *Financial Education*. Paper presented at the 33rd Annual Legislative Conference, Washington, DC.
- Grinstein-Weiss, G., M., Wagner, K., & Ssewamala, F. (2006). Saving and Asset Accumulation Among Low Income Families with Children. *Children and Youth Services Review*, 28, 193-211.
- Grinstein-Weiss, M., Spader, J., Yeo, Y. H., Taylor, A., & Feeze, E. B. (2011).

  Parental Transfer of Financial Knowledge and Later Credit Outcomes among Low and Moderate Income Homeowners. *Childrens and Youth Service Review*, (33)1, 78 85.
- Hajah Che' Asniza, O., Jahjaiton, A., & Badariah, M. S. (2005). *Penglibatan Anak- anak Peneroka dalam Bidang Keusahawanan:* Satu kajian di kawasan

- Felda wilayah Jengka, Pahang. Institut Penyelidikan Pembangunan dan Pengkomersilan, Universiti Teknologi Mara, Shah Alam.
- Heckman, S. J., & Grable J. E. (2009). Personal Finance Knowledge and Self-efficacy among College Students. *College Student Journal*. Project Innovation (Alabama). Education Copyright: 2011. Project Innovation (Alabama). ISSN: 0146-3934
- Hilgert, M., Hogarth, J., & Beverly, S. (2003). Household Financial Management: The Connection between Knowledge and Behavior. Federal Reserve Bulletin, 309-322.
- Huston, S. J. (2010). Measuring Financial Literacy. *The Journal of Consumer Affairs*, 44(2), 296-316. Retrieved from <a href="http://dx.doi.org/10.1111/j.1745-6606.2010.01170.x">http://dx.doi.org/10.1111/j.1745-6606.2010.01170.x</a>
- James, M. M. Jr. (2011). Examining the Disparity in Financial Literacy between High School Seniors of Difference Ethnicities and Income Level. (ProQuest Dissertation and Thesis. Northcentral University. Presscott Valley Arizona)
- Kempson, E., Collard, & Moore, S. N., (2006). *Measuring Financial Capability: An Exploratory Study for the Financial Services Authority*. In European Credit Research Institute (Ed.), Consumer Financial Capability: Empowering European Consumers Brussels: The European Credit Research Institute (ECRI), 39-77.

- Kim, J. (2007). Workplace Financial Education Program: Does it have an impact on employee's personal finances? *Journal of Family and Consumer Science*, 99(1).
- Lane, S. M. (2009). Consumer Credit Card Behavior in South Dakota: A Pilot Investigation (Unpublished doctoral dissertation). South Dakota State University, Brookings, SD.
- Loibl, C. & Hira, T. K., (2005). Self Directed Financial Learning and Financial Satisfaction. *Journal of Financial Counseling and Planning*, (16)1: 11-21.
- Lusardi, A. (2006). Financial Literacy and Financial Education: Review and Policy implications.

  Retrieved from <a href="http://www.networksfinancialinstitute.org/lists/Publication%20Library/Attac">http://www.networksfinancialinstitute.org/lists/Publication%20Library/Attac</a>

  hments/27/2006-PB-11\_Lusardi.pdf
- Lusardi, A. (2008a). Financial Literacy: An Essential Tool for Informed Consumer Choice? Dartmouth College, Harvard Business School, and NBER.
- Lusardi, A. (2010, February). *Americans' Financial Capability*. Report for the Financial Crisis Inquiry Commission. Washington, DC.

- Lusardi, A., & Mitchell, O. S. (2005). Financial Literacy and Planning:
  Implications for Retirement Wellbeing. Michigan Retirement Research
  Center Research Paper No. WP 2005-108. March 1, 2008. Retrieved from <a href="http://ssrn.com/abstract=881847">http://ssrn.com/abstract=881847</a>.
- Lusardi, A., & Mitchell, O. S. (2006). Financial Literacy and Planning: Implications for Retirement Wellbeing. *Working Paper, Pension Research Council*, Wharton School, University of Pennsylvania.
- Lusardi, A., & Mitchell, O. S. (2007a). "Baby Boomer Retirement Security:

  The Role of Planning, Financial Literacy, and Housing Wealth," *Journal of Monetary Economics*, 54, 205-224.
- Lusardi, A., & Mitchell, O. S. (2007b). "Financial Literacy and Retirement Planning: New Evidence from the Rand American Life Panel." Pension Research Council Working Paper WP2007-3.
- Lusardi, A., & Mitchell, O. S. (2007c, January). "Financial Literacy and Retirement Preparedness: Evidence and Implications for Financial Education," *Business Economics*, 35-44.
- Lusardi, A., & Mitchell, O. S. (2008a). "Planning and Financial Literacy. How Do Women Fare?" *American Economic Review*, 98(2), 413-417.

- Lusardi, A., & Mitchell, O. S. (2008b, March). "How Much Do People Know About Economics and Finance? Financial Illiteracy and the Importance of Financial Education,". *Policy Brief*, 5, MRRC.
- Lusardi, A., & Mitchell, O. S. (2009). "How Ordinary Consumers Make Complex Economic Decisions: Financial Literacy and Retirement Readiness." NBER Working Paper 15350.
- Lusardi, A., & Mitchell, O. S. (2011a, May). "Financial Literacy and Planning: Implications for Retirement Wellbeing". National Bureau of Economic Research Working Paper 17078.
- Lusardi, A., & Mitchell, O. S., (2011b, June). "Financial Literacy and Retirement Planning in the United States"., National Bureau of Economic Research Working Paper 17108.
- Lusardi, A., Mitchell, O. S., & Curto, V. (2010). Financial Literacy Among the Young. *The Journal of Consumer Affairs*, 44(2), 358-380. http://dx.doi.org/10.1111/j.1745-6606.2010.01173.x
- Malaysia Financial Planning Council, MFPC. (2004). *RFP Module 1*. *Fundamentals of Financial Planning*, 3<sup>rd</sup> ed., MFPF, Kuala Lumpur.

- Marzieh, K. T., Zare, Z. H., Seyyed, M. T. M. & Abdoreza, R. (2013). The Relation between Financial Literacy, Financial Wellbeing and Financial Concerns. *International Journal of Business and Management*, 8(11). ISSN 1833-3850 E-ISSN 1833-8119. Published by Canadian Center of Science and Education.
- Markovich, C. A. & DeVaney, S. A. (1997). College Seniors' Personal Finance Knowledge and Practices. *Journal of Family and Consumer Sciences*, 89(3), 61-65.
- Mohamad Fazli, S. (2011). Pathways to Financial Success: Determinants of Financial Literacy and Financial Well-being among Young Adults. Graduate Theses and Dissertations. Paper 11205. Iowa State University.
- Mohamad Fazli, S., & Leila Falahati (2012, October). Estimating a Model of Subjective Financial Well-Being Among College Students. *International Journal of Humanities and Social Science*, 2(18).
- Mohamad Fazli, S., MacDonald, M., Hira, T. K., & Masud, J. (2010). Childhood consumer experience and the financial literacy of college students in Malaysia. Family and Consumer Sciences Research Journal, 38(4), 455 467.
- Mohamad Fazli, S., Christine, C. C., Mack, S., Tahira K. H., Steve G., & Pat, S. (2011). Early Childhood Consumer Experience, Financial Socialization, and

Financial Knowledge Pathways. Journal of Financial Counseling and Planning.

Mohamed, E. I., & Fatima, R. A. (2013). Financial Literacy, Personal Financial Attitude, and Forms of Personal Debt among Residents of the UAE. *International Journal of Economics and Finance*, 5(7). ISSN 1916-971X E-ISSN 1916-9728.

Money Forecast Issue. (1993). "What Your Investing IQ?" Money Magazine, 71.

Moore, D. (2003). Survey of financial literacy in Washington State: Knowledge, Behavior, attitudes and experiences (Technical Report No. 03-39). Pullman, WA: Washington State University, Social and Economic Sciences Research Center.

Monticone, C. (2010). How Much Does Wealth Matter in the Acquisition of Financial Literacy. *Journal of Consumer Affairs*, 44, 403-422. http://dx.doi.org/10.1111/j.1745-6606.2010.01175.x

Morrison, W. G. (2009). Behavioural elements of savings decisions: an initial investigation of entitlement and discount rates in a laboratory experiment.
 Task Force on Financial Literacy Secretariat, Department of Finance,
 Government of Canada.

- Munoz, H. L. (2009). Being & becoming financially literate in a South Texas community: Valuing the funds to practice literacy (Unpublished doctoral dissertation). The University of Texas at San Antonio, San Antonio, TX.
- Nik, A. H., Zaleha, K., & Sahari, N. (2010). Social problems and its relationship with family institution in Felda settlements: The local perspective. *European Journal of Social Sciences*, 14(3), 369-386.
- Noon, K. L., & Fogarty, G. J. (2007, September). *Cognitive and Personality*\*Predictors of Financial Literacy Among Adult Australians. In: 42nd

  \*Australian Psychological Society Annual Conference. Brisbane, Australia.
- O'Hara, A. (2003). Both a borrower and a saver be: Housing in the household portfolio. Retrieved from ProQuest Dissertations and Theses database. (UMI No. 3080998).
- Overton, R. H. (2007). An empirical study of financial planning: Theory and practice. (Unpublished doctoral dissertation). Minneapolis, MN: Capella University.
- Remund, D. L. (2010). Financial literacy explicated: The case for a clear definition in an increasingly complex economy. *The Journal of Consumer Affairs*, 44(2), 276-295. http://dx.doi.org/10.1111/j.1745-6606.2010.01169.x

- Ritter, J. R. (2003). Behavioral finance. *Pacific-Basin Finance Journal*, 11(4), 429-437.
- Robb, C. A. (2008). Financial Knowledge and Credit Card Behavior of College Students. *Journal of Family and Econimic Issues*, 690-698.
- Rooij, M. V. (2009). Financial Literacy, Retirement Provisions, and Household Portfolio Behaviour (Unpublished doctoral dissertation). Utrecht University, Netherlands.
- Scott, E. K. (2012). Factors and Behaviors that Influence Financial Literacy in U.S. Households. H. Wayne Huizenga School of Business and Entrepreneurship, Nova Southeastern University. Copyright 2012 by ProQuest LLC.
- Shim, S., Xiao, J. J., Barber, B. L., & Lyons, A. (2009). Pathwaystolife success:

  A conceptual model of financial well-being for young adults. *Journal of Applied Developmental Psychology*, 30(6), 708-723.
- Smith, B. (2005, June). *Improving Financial Literacy and Capability*. OECD's Financial Education Project: Presentation to "Canadians and Their Money: A National Symposium on Financial Capability." Ottawa.
- Tan, H. B., Hoe, S. Y., & Hung, W. T. (2011). Financial Literacy and Personal Financial Planning in Klang Valley, Malaysia. *International Journal of Economics and Management*, 5(1): 149-168.

- Thilakam, C. (2012). *Financial Literacy Among Rural Masses in India*. The 2012 International Conference on Business and Management, 6-7 Sept, Phuket, Thailand.
- U.S Financial Literacy and Education Commission. (2007). C/O Office of
   Financial Education Department of the Treasury, 1500 Pennsylvania
   Avenue, N.W.Washington, DC United States. Retrieved from:
   http://www.mymoney.gov
- Volpe, R. P., Chen, H., & Liu, S. (2006). An analysis of the importance of personal finance topics and the level of knowledge possessed by working adults. *Financial Services Review*, *15*(1), 81-98.
- Volpe, R. P., Chen, H., & Pavlicko, J. (1996). Personal Investment Literacy Among College Student: A Survey. Financial Practice and Education, 6(2), 86-94.
- Xiao, J. J., Serido, J., Shim, S. (2010). Financial Education, Financial Knowledge and Risky Credit Behavior of College Students. (2010-WP-05).
  Indiana State University: Networks Financial Institute. Working Paper 2010-WP-05. SSRN: <a href="http://ssrn.com/abstract=1709039">http://ssrn.com/abstract=1709039</a>. Retrieved from: <a href="http://dx.doi.org/10.2139/ssrn.1709039">http://dx.doi.org/10.2139/ssrn.1709039</a>.
- Yang, H. (2010, Feb). *The Important of Financial Literacy*. Book: About Campus. 14. (6), 15-21.