



A STUDY ON AWARENESS ABOUT INNOVATION IN EDUCATING TAX PAYERS IN SIVAKASI

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Abstract

Tax education means building tax culture, compliance and citizenship. It is not only about encouraging people to pay taxes, but also about explaining taxation and its place in society as a whole. Tax education is a long-term strategy of building tax culture of voluntary compliance. With the development of AI technology, a new forecasting and statistical model for tax auditing has been shaped. In recent years, recognition to breakthroughs in AI research, tax professionals have gained new analytical and statistical tools, providing convenience and improving efficiency. AI provides simulated tax risks, which can help more complex human judgments to be made. AI can also aid detection of fraud, contributing to its supervision and monitoring by government. The development of AI continues, and its use has definite limits and risks that must be accepted.

Keywords: Artificial Intelligence(AI), Tax Education.

Introduction

A tax payer is an individual or entity that is required to make payments to municipal or government taxation-agencies. The taxpayers' money becomes part of the public funds, which comprise all money spent or provided by government to assure individual or collective needs or to create future benefits. For tax purposes, business entities are also taxpayers, making their revenues and expenditures focus to taxation.

Artificial Intelligence is Solving Complex Problems. Taxation has always been integral to a firm, assuring compliance with tax laws and regulations. In these years, the focus has been driven towards risk and compliance management, due to which the tax industry is changing. Artificial Intelligence (AI) technology acts as an influential tax research tool that gives answers to all complex questions, both qualitative and quantitative insights.

The combination of blockchain technology in tax filing processes brings about improved exactness and security while also reducing administrative burdens. This, in turn, enables tax professionals to concentrate on delivering strategic advice to their clients. Robotic Process Automation (RPA) is Streamlining Tax flows.

Robotic Process Automation (RPA) is a technology that utilizes software robots or bots to automate the process of tax filing, freeing employees for strategic goals. RPA categorizes the extracted data into categories such as invoice receipts, automatically organizing it for tax filing and generating accurate tax reports compliant with tax regulations. With automated filing of tax returns, professionals can easily ensure timely and accurate documentation and added tasks, such as payment reminders and more. E-filing and digital signatures bring a range of benefits for tax professionals and their clients, such as



eliminating the need for paper-based filing implicating digital signatures, resulting in a more streamlined and environmentally friendly procedure.

Objectives of the study

1. To learn the level of awareness about innovation in educating tax payers in Sivakasi.
2. To find out the most suitable tax educating tools used to save tax.
3. To make appropriate suggestion and conclusion.

Statement of the problem

This study is in the area of educating tax payers regarding innovation in taxation among Sivakasi tax payers. Tax payers discover it difficult to use innovation system of tax return because some of them are not aware with electronic transaction and some of them were not computer know-how. Some of the tax payers are not able to use internet and have less computer skill. Some of the tax payers are concerned about the security problem. All these result in low usage of electronic system. Therefore it is very essential to study the awareness level and dares of individual tax payers towards educating innovation of income tax return.

Review of literature

Suchithra P¹, Assistant Professor, Department of commerce, CCST for Women Karalmanna. **Vidhya C²**, Fourth M com, Department of commerce, CCST for Women Karalmanna. **“A Study on the Awareness of Tax Saving Instruments of Individual Tax Payers”** In their research work highlighted that Tax planning means the assessment of one’s financial affairs without breaking the legal provisions of an act. It reduces the burden of taxation of an assessee by taking the full advantage of exemptions, deductions, rebates and relief permitted under the act. Overall findings of the study reveals that 80C deduction is the most adopted tax saving instrument and 80EE is the second most adopted tax saving instrument. Tax planning is not just a strategy to reduce tax burden. It helps to save tax by encouraging investments in Government Securities.

Aparna Medda Santra State Aided Contractual Teacher AKPC Mahavidyalaya, Purba Bardhaman **“Artificial Intelligence: It’s Impact on Accounting- A Review Work”** In their research work highlighted that Artificial intelligence has great impact in every spheres of economy. The increasing role of artificial intelligence in the field of accounting has raised the question about the future of the profession. The basic Idea and various field of application of AI in accounting, has been discussed here. In this study the opinion of various reviewers are analyzed and a comparison is made to get the impact of AI in accounting profession. They need to develop some Technological skills. It focuses that there is significant impact on accounting profession and adapting the change arises due to implementation of AI, this profession may glorify the competitive job market. Educationalist should improve and modernize their syllabus for students to learn the new technology.

Ankit Rathi¹, PhD Research Scholar, School of Business & Commerce, Manipal University Jaipur . **Dr. Saurabh Sharma²**, Associate Prof., School of Business & Commerce, Manipal University Jaipur. **Dr. Gaurav Lodha³**, Professor, School of Business & Commerce, Manipal University Jaipur (Corresponding Author) **Dr. Manoj Srivastava⁴**, Professor, School of Hotel Management, Manipal University Jaipur. **“A Study on Application of Artificial Intelligence and Machine Learning in Indian Taxation System”** Highlighted that In a developing economy like India taxation is a main source of public finance. Indian taxation system always suffered from problems such as tax evasion, inefficient administration etc. Administration of taxation always needs such a system which will be less in error

and prompt in decision making. Indian taxation system is suffering from lack of manpower to perform the tasks such as data entry, scrutiny of return, tax audit etc. If the taxpayers trust on entire tax system then only they will provide the correct data and due to that we will be able to get a very strong tax administration system but for that government need to make people aware about the system and make the system transparent so that it will build the taxpayers trust and they will accept this as a helping tool for fair and transparent Indian Tax System.

Zhuowen Huang, Nanfang College of Sun Yat-sen University, Guangzhou, China “**Discussion on the Development of Artificial Intelligence in Taxation**” This study highlighted that With the development of AI technology, a new forecasting and statistical model for tax auditing has been created. In recent years, thanks to breakthroughs in AI research, tax professionals have gained new analytical and statistical tools, providing convenience and improving efficiency. These tools have formed the basis for systematic frameworks that avoid the disorder and complexity of data processing and analysis in Excel spreadsheets. The main limitation of this paper is to present facts of AI development in China and pinpoint potentials of using AI in taxation in China. It presents the reality of AI being developed in China without substantial researches and data analysis.

Hypotheses

In this study the following hypotheses have been framed to analyse the awareness level of innovation in educating tax payers. There is no significant relationship between age, gender, educational qualification, employment and income level of the tax payers and level of awareness of innovation in taxation.

Research Methodology

This study is a descriptive in nature conducted to know the level of awareness of tax education. This study is conducted through non-random sampling techniques and convenience sampling method is used. The sample size of this study is 120 and interview schedule is used for collecting the primary data.

Sample Size: The sample sizes of the 120 tax payers were selected from Sivakasi.

Statistical Tools

After the completion of the survey, the researcher has thoroughly verified the data. Afterwards the data have been edited. After the processing the data have been entered on a master table. To analyse, the researcher has used the manual process with the help of calculator. The statistical tools such as percentage, chi-square test and Garrett ranking have been used in educating tax payers.

Level of awareness of innovation in taxation

Mobile Application and Software: Mobile application is Greater reach and user friendly. A mobile app featuring modules- tax reminder, tax calculator, instant pay, instant file, etc, where the taxpayers can check their liability, pay taxes, file returns etc. with their registered mobile number or PAN.

Tax Education programme: It is a long-term cultural shift through School Tax Education Programme (STEP), targeting primary, secondary and tertiary level schools and college/ Universities fun and engagement programme for children such as Tax camp, Tax slogan/ poster competition etc.

Tax workshop: Tax workshop at management and business institutions in urban areas for small and micro businesses to provide basic education on taxation.

Finding of Results

Classification of Demographic Profile

Gender Table-1

Gender	No.of Tax payers	Percentage
Male	65	54.17
Female	55	45.83
Total	120	100.00

From this table, it is understood that out of 120 tax payers, 65 (54.17) per cent tax payers are male and the remaining 55 (45.83) per cent of them are female. It is concluded that a majority (54.17) per cent of the tax payers assesses are male.

Age Table-2

Age	No.of Taxpayers	Percentage
Upto 30years	28	23.30
30-40years	20	16.70
40-50years	42	35.00
Above50years	30	25.00
Total	120	100.00

This table shows that out of 120 tax payers, 23.30 per cent of the tax payers belong to age group of up to 30years, 16.70percentofthembelongtotheagegroupbetween30and40years, 35percentofthem belong to the age group between 40 and 50 years and the remaining 25 per cent of the tax payers belong to the age group above 50 years. This studyshows that a sizeable number (35) per cent of the tax payers are belonging to the age group of 40 and 50 years.

Educational Qualification Table-3

Educational Qualification	No.of Tax payers	Percentage
Schoollevel	40	33.30
Graduatelevel	66	55.00
Professionallevel	14	11.70
Total	120	100.00

This table examines that out of 120 tax payers, 40 (33.30) per cent of the tax payers have studied school level, 66 (55.00) per cent of them have studied graduates and the remaining 14 (11.70) percent of the taxpayers have studied professional levels. It is clear that a considerable number (55.00) percent of the tax payers have studied graduate level.

Employment Table-4

Employment	No.of Tax payers	Percentage
Government	10	8.33
Private	40	33.34
Professional	10	8.33
Business	60	50.00
Total	120	100.00

From this table it is understood tax out of 120 tax payers, 10 (8.33) per cent of the tax payers are working in Government field, 40 (33.34) percent of them are working in Private Sector, 10 (8.33) per cent of the tax payers are doing professional and the remaining 60 (50) per cent of the tax payers are in business field. It is clear that a considerable number (50.00) per cent of the taxpayers are doing business.

Income Level Table-5

Income level	No.of Taxpayers	Percentage
Less than 30000	32	26.70
30000-40000	22	18.30
40000-50000	42	35.00
50000-60000	12	10.00
60000 above	12	10.00
Total	120	100.00

This table shows that out of 120 tax payers, 32 (26.7) per cent of the tax payers have yearly income range less than Rs.30000, 22 (18.3) per cent of them are earning yearly income range between 30000 and 40000, 42 (35.00) per cent of them earning the yearly income range between 40000 and 50000, 12 (10) per cent of them are earning yearly income range between 50000 and 60000 and remaining 12 (10) per cent of the taxpayers are earning yearly income range 60000 above. An analysis of the yearly income range of the taxpayers has revealed that a majority (35.00) percent of the taxpayers are earning yearly income range between 40000 and 50000.

Test of Significance Chi-Square Test

The chi-square is one of the simplest and most widely used non-parametric tests in statistical analysis. The symbol of the Greek Chi χ^2 . The χ^2 test was first used by Karl Pearson in the year 1900. The quality χ^2 describes magnitude of the discrepancy between theory and observation. The data in chi-square tests is often in terms of count or frequencies. The actual survey data may be on a nominal or higher scale of measurement. If it is higher scale of measurement, it can always be converted into categories.

The chi-square test is an important test amongst the several tests of significance developed by statisticians. Chi-square, symbolically written as χ^2 (pronounced as chi-square), Chi-square as a test of independence enables a researcher to explain whether or two attributes associated or not and the formula used is furnished below;

$$E = \frac{\text{Rowtotal} * \text{columntotal}}{\text{Grandtotal}}$$

D.F=Degree Freedom (D.F) =(c-1) (r-1)Where, O = Observed frequency E = Expected frequency c = Number of columnsr = Numbers of rows. The value obtained as such should be compared with relevant table value and inference can be draw. If the calculated value is greater than the table value the hypotheses framed will be rejected,otherwise accepted.

Gender And Their Level of Awareness Regarding Tax Education Table-6

Cell	O	E	O-E	O-E ²	O-E ² /E
R1C1	15	16.25	1.25	1.5625	0.096
R2C1	15	13.75	1.25	1.5625	0.113
R1C2	8	13	5.00	25.00	1.923
R2C2	16	11	5.00	25.00	2.27
R1C3	42	35.75	6.25	39.06	1.092
R2C3	24	30.25	6.25	39.06	1.291
					6.785

Degree of freedom=(c-1)(r-1)
 =(3-1)(2-1)
 =2*1
 =2

Table value of x² at 5% level=5.99 Calculated value of x²= 6.785

Since of calculated value (6.785) is more than the table value, the null hypothesis is rejected. It is concluded that there is a significant relationship between the gender of the tax payers and the level of awareness regarding tax education. It is concluded that the gender influences the perception towards tax education.

Age And Their Level of Awareness Regarding Tax Education Table-7

Cell	O	E	O-E	O-E ²	O-E ² /E
R1C1	8	8.4	0.4	0.16	0.019
R2C1	6	6.00	0	0	0
R3C1	18	12.6	5.4	29.16	2.13
R4C1	4	9.00	5.00	25.00	2.77
R1C2	6	4.43	1.57	2.46	0.55
R2C2	4	3.16	0.84	0.70	0.22
R3C2	4	6.65	2.65	7.02	1.05
R4C2	5	4.75	0.25	0.06	0.012
R1C3	14	15.16	1.16	1.34	0.088
R2C3	10	10.83	0.83	0.68	0.62
R3C3	20	22.75	2.75	7.56	0.33
R4C3	21	16.25	4.75	22.5	1.38
					8.789

$$\begin{aligned} \text{Degree of freedom} &= (c-1)(r-1) \\ &= (3-1)(4-1) \\ &= 2*3 \\ &= 6 \end{aligned}$$

Table value of χ^2 at 5% level = 12.59 Calculated value of $\chi^2=8.789$

Since of calculated value (8.789) is less than the table value, the null hypothesis is accepted. It is concluded that there is no significant relationship between the age of the tax payers and the level of awareness regarding tax education. It is concluded that the age does not influence intax education.

Educational Qualification And Their Level of Awareness Regarding Tax Education Table-8

Cell	O	E	O-E	O-E ²	O-E ² /E
R1C1	8	8.7	0.7	0.49	0.056
R2C1	16	14.3	1.7	2.89	0.202
R3C1	2	3.03	1.03	1.06	0.349
R ¹ C2	6	7.7	1.7	2.89	0.375
R ² C2	15	12.65	2.35	5.52	0.436
R3C2	2	2.68	0.68	0.46	0.171
R1C3	26	23.7	2.3	5.29	0.223
R2C3	35	39.05	4.05	16.40	0.419
R3C3	10	8.28	1.72	2.92	0.352
					2.583

$$\begin{aligned} \text{Degree of freedom} &= (c-1)(r-1) \\ &= (3-1)(3-1) \\ &= 2*2 \\ &= 4 \end{aligned}$$

Table value of χ^2 at 5% level = 9.49 Calculated value of $\chi^2=2.583$

Since of calculated value (2.583) is less than the table value, the null hypothesis is accepted. It is concluded that there is no significant relationship between the educational qualification ofthe tax payers and the level of awareness regarding tax education. It is concluded that the educational qualification does not influence in tax education.

Employment And Their Level of Awareness Regarding Taxeducation Table-9

Cell	O	E	O-E	O-E ²	O-E ² /E
R1C1	2	2.25	0.25	0.0625	0.027
R2C1	6	9.00	3.00	9.00	1.00
R3C1	4	2.25	1.75	3.06	1.36
R4C1	15	13.5	1.5	2.25	0.16
R1C2	2	0.91	1.09	1.18	1.305
R2C2	4	3.66	0.34	0.11	0.030
R3C2	-	0.91	0.91	0.82	0.90
R4C2	5	5.5	0.5	0.25	0.04
R1C3	6	6.83	0.83	0.68	0.09

R2C3	30	27.3	2.7	7.29	0.26
R3C3	6	6.83	0.83	0.68	0.09
R4C3	40	41	1.00	1.00	0.024
					5.256

Degree of freedom=(c-1)(r-1)
 =(3-1)(5-1)
 =2*4=8

Table value of χ^2 at 5% level = 15.51 Calculated value of $\chi^2=5.256$

Since of calculated value (5.256) is less than the table value, the null hypothesis is accepted. It is concluded that there is no significant relationship between the employment of the tax payers and the level of awareness regarding tax education. It is concluded that the employment does not influence in tax education.

Income Level And Their Level of Awareness Regarding Tax Education Table-10

Cell	O	E	O-E	O-E ²	-E ² /E
R1C1	4	5.3	1.3	1.69	0.318
R2C1	4	3.6	0.4	0.16	0.044
R3C1	6	7.00	1.00	1.00	0.142
R4C1	4	2.00	2.00	4.00	2.00
R5C1	2	2.00	-0	0	0
R1C2	4	4.20	0.2	0.04	0.009
R2C2	6	2.9	3.1	9.61	3.313
R3C2	2	5.6	3.6	12.96	2.314
R4C2	-	1.6	1.6	2.56	1.6
R5C2	4	1.6	2.4	5.76	3.6
R1C3	24	22.4	1.6	2.56	0.114
R2C3	13	15.4	3.4	11.56	0.750
R3C3	34	29.4	4.6	21.16	0.719
R4C3	8	8.4	0.4	0.16	0.019
R5-C3	6	8.4	2.4	5.76	0.682
					15.627

Degree of freedom=(c-1)(r-1)
 =(3-1)(5-1)
 =2*4=8

Table value of χ^2 at 5% level =15.51 Calculated value of $\chi^2=15.627$

Since of calculated value (15.627) is more than the table value, the null hypothesis is rejected. It is concluded that there is a significant relationship between the monthly income of tax payers and the level of awareness regarding tax education. It is concluded that the income influences in tax education.

Garret Score

Latest Technology for Tax Education: The Garret are calculated by using appropriate garret ranks, the garret value is ascertained. The Garret table values and scores of each rank is given in table 4.28. finally by adding each row, total Garret score is obtained

$$\text{Percentposition} = \frac{10(\text{Rij}-0.5)}{N_j}$$

Rij=Rank given for the i^{th} variable by the j^{th} respondent N_j =Number of various ranked by the j^{th} respondent.

Latest Technology for Tax Education Table-11

Particulars	I	II	III	IV	V	Total
Block Chain	30	21	25	22	22	120
Robotic Process Automation (RPA)	18	31	30	27	14	120
E-filing and Digital Signature	7	28	39	26	20	120
Artificial Intelligence	37	17	21	24	21	120
Cloud-based tax preparation	28	23	5	21	43	120
	120	120	120	120	120	

Source: Primary Data.

This table shows that Garret scores. Firstly the Garret ranks are calculated by using appropriate Garret ranking formula. Then based on the Garret ranks, the Garret table and score multiplied to find out source in table which are then multiple by row, the garret scores have been obtained.

Factors Influencing The Best Tax Free Investment–Garret Table-12

Particulars	Total score	Average	Rank
Block Chain	6168	51.4	II
Robotic Process Automation(RPA)	6113	50.9	III
E-filing and Digital Signature	3669	47.2	IV
Artificial Intelligence	6306	52.55	I
Cloud-based tax Preparation	5624	46.87	V

Source: Computed Primary Data

It is observed from the table that Artificial Intelligence“ has been ranked as the first factor to influence the tax payers to know latest innovation in taxation. Block Chain“ has been ranked as second, Robotic Process Automation(RPA)“ placed in the third positions, and it is followed by „E-filing and Digital Signature“ the for thrank and „Cloud-based tax Preparation“ ranked as the fifth rank.

Summary of Finding

This study is a human attempt to analysis the various factors that improve the awareness of innovation in educating tax payers in Sivakasi with the aim of offering some profitable suggestions. To study the innovation in tax education, 120 tax payers were and only selected from Sivakasi and their opinion way obtained.

1. Among the tax payers surveyed (45.83) percent is female and(54.17) percent male. A majority(54.17) per cent of the sample tax payers are male.
2. More than half of the tax payers (35) percent surveyed are in the age group of the 40-50 years Among the surveyed tax payers (55) percent are graduates.
3. Among the surveyed tax payers (50) percent of the tax payers are doing business.
4. Out of 200 tax payers (26.7) per cent of the tax payers are belonging to the income group of less than Rs.30000, (18.3) per cent of the taxpayers are in the income group of Rs.30000-40000, (35) per cent of the taxpayers earn income of 40000- 50000, (10) per cent of the tax payers earn income of Rs.50000-60000, (10) per cent of the taxpayers earn income of above Rs.60000.
5. It is observed from the table that, „Artificial Intelligence“ has been ranked as the first factor to influence the tax payers to know latest innovation in taxation. „Block Chain“ has been ranked as second, „Robotic Process Automation (RPA)“ placed in the third positions, and it is followed by „E-filing and Digital Signature“ the fourth rank and „Cloud - based tax Preparation“ ranked as the fifth rank.

Suggestion

The following suggestions suggested by the researcher for educating tax payers through innovation in various tax tools.

1. The researcher has suggested that tax mobile app is us a friendly and it provides information relating to tax remainder, tax calculator, instant pay, instant file etc.,
2. The researcher has also referred that tax catching awareness quotos such as I pay my tax, I serve my country make awareness of tax education.
3. The researcher recommended that tax vehicle campaign tax awareness programme and tax workshop provide basic education on taxation.
4. The researcher suggested that social media like Facebook, linkdin, Instagram and various tax app like. Intuit Turbo Tax, Tax act 2024, Tax slayer 2024 also strengthen tax education.
5. The researcher has concluded that Artificial Intelligence is the best tax research tool for answering complex questions, for calculating tax liabilities and help tax professionalsto face complex tax issues.

Conclusion

The main attention of this paper is to show the changing scenario of tax education due to innovations in tax education .The above facts and figure clearly shows that India is in the point of innovative change in information technology in innovations of educating taxpayers. Sufficient training and skill development techniques to be implemented by the organizations so that these can go with the existing work force. New rules regulation and policies to be made by the government to provide cyber security. Thus there should be the clear path for development with the help of modern technology.

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