



CYBER CRIME AND CYBER LAW AWARENESS AMONG YOUTH: AN EMPIRICAL STUDY

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Abstract

The growing reliance on the internet has significantly increased the global prevalence of cybercrimes. These crimes represent a modern wave of illicit activities conducted through online means. The surge in internet usage, coupled with a demand for proper education, guidance, and coaching on cybersecurity, along with a lack of awareness among the youth, has fueled the rise of cybercrimes. Presently, young individuals are particularly vulnerable to internet-related crimes. A concerning reality is that users are not being adequately informed about the severe threats and security issues associated with the rapidly advancing use of internet-enabled devices. Addressing the issue of cybercrimes is imperative, especially given the high susceptibility of young individuals to falling victim to such crimes. This paper focuses on raising awareness of cybercrime and Cyber Law among the youth. The study conducted a survey with a sample of 228 respondents to examine the factors influencing cybercrime and the level of awareness among youth regarding cyber law. The research also investigated the impact of cyber law awareness on the occurrence of cybercrime. The findings indicate that factors such as Internet-related crimes, preventive solutions, reasons behind cybercrime, and awareness about cybercrimes and Cyber laws play crucial roles in determining the incidence of cybercrime and awareness among youth. The study concludes that there is a significant impact of cyber law awareness on reducing cybercrime.

Keywords: Cybercrime, Cyber Law, Cyber Law Awareness, Cyber Law and Youth, Online Crimes

I. Introduction

Cybercrime has emerged as an advanced pattern or form of crimes. It requires a far-reaching state of art structure to knuckle down these forms of advanced crimes. This is importing an uncommon trouble because the long-established laws do not correspond with such threats. The hasty acceptance of the internet globally has resulted not only in computer crimes like hacking or cracking but also includes intolerable crimes like hacking, cracking, extortion, defamation, child pornography, money laundering fraud, harassment via internet, blackmailing, software pirating, corporate espionage and so on. The use of smart phones and internet-enabled electronic gadgets has become an important part of everyone's life, especially the youth. This interference with the internet has opened gates for cybercrimes to get into the life of common people. The worst part is that internet users are not even aware when they are becoming victims of cybercrime. This lack of awareness of such problems would lead to harsh destruction on financial, emotional, moral, or ethical grounds (Halder & Jaishankar, 2011).

As the younger generation becomes increasingly immersed in the virtual realm, they are particularly vulnerable, especially in technologically advanced countries. The technological innovations prevalent in these societies contribute to cybercrimes targeting the youth. Children and adolescents, being avid users of the internet and social networking sites, constitute a sensitive demographic more susceptible to online threats. The repercussions of these threats are particularly severe, with cybercrimes exerting a detrimental impact on the lives of the youth. One of the primary challenges faced by young people on the internet today is cyberbullying, with victims experiencing misinformation and disrespectful messaging as forms of online harassment. Additionally, an escalating worry involves the prevalence of sexual solicitation among youths and teenagers who engage in cyber communication. This form of solicitation commonly takes place on social networking platforms and in chat rooms where individuals are prompted to share personal information, view explicit content, or engage in online discussions about sex. Approximately 70% of the victims of such crimes are female teenagers. Given this critical scenario, addressing cybercrimes alone is insufficient. It is imperative to take further steps in prioritizing the creation of awareness about cybercrimes and enhancing security measures. (Lehdonvirta & Räsänen, 2011; Görzig & Ólafsson 2011).

The prevailing mindset among youth, seeking quick wealth, has become a weapon turned against them. What is even more startling, according to the data, is that highly educated and skilled young individuals are involved in these crimes. A political science study revealed a 40% surge in crimes attributed to the younger generation, driven by factors such as the allure of easy money, lack of employment opportunities or income sources, and a desire for attention (Jadhav and Makwana, 2023). Given the escalating prevalence of cybercrimes affecting the youth, it is crucial for parents and guardians to assess whether their children are susceptible to various cyber threats or not. (N. Thabet and T. R. Soomro, 2015).

Literature Review

Characterized by distinct features, cybercrimes are the novel and sophisticated forms of crimes involving the misuse of computers and comparable electronic devices. A recent study on cybercrimes had noted an uncomplicated and robust definition in which cybercrimes are executed by using a computer or mobile to target a similar device by transforming the information (Joshi, 2016). Cybercrimes involve the actions of malicious operators or programmers, commonly known as hackers, who can disrupt websites and gather confidential data or information using the internet (Pahuja, 2016). A significant difference exists in the awareness of cybercrime between young girls and boys. According to the study by Ahmed (2019), it was observed that males exhibit a higher level of knowledge about cybercrimes compared to their female counterparts. Additionally, recent findings indicate a significant disparity in knowledge between rural and urban youth. Research conducted by Suvera and Tailor (2020) revealed that urban youth demonstrate a greater awareness of prevalent cybercrimes on the internet compared to their counterparts in rural areas.

Today the education system has changed a lot and technology has become an important part of the system and it needs to be improved. Here, teachers can play an important role by teaching students and making them aware of cyber security issues and crimes. Students also need to be tutored to overcome cybercrimes and related problems (Islam, 2012). The legitimate awareness of the youth about cybercrimes as well as laws related to the same can only be established with the proper coordination between parents and teachers. They can properly guide the youth and teenagers on safety-related issues. To constitute a decent awareness system, cybercrime awareness and prevention courses must be an elemental part of training, (Asefeh, 2007).

The agility of the internet and conviction of the same now became helpful for cyber criminals to execute their illegal cyber activities. Internet users need to be aware not only of cybercrimes but also of the laws associated with them. People need to identify the crimes that they can or have been victims of. The study revealed that cybercrimes related knowledge and awareness can be extended by emphasizing it. To constrict or prevent internet illegal activities this can act as an efficient tool. In this study, it was also found that the net user and government need to be responsible to incur protected, guarded, intact and authentic internet service, (Agrawal, 2015). The knowledge about cyber laws in India significantly varies as male users are more aware of these laws and regulations when compared to women users. The awareness level of males is on the higher side compared to females (Mehta and Singh, 2013).

To stop crimes pledged through the internet, Cyber Laws are introduced. Cyber laws or legislation is defined as the legal or judicial matters related to the application of communication or connecting technology, specifically 'cyberspace', also known as the internet. These cyber-related laws aim to mitigate the challenges provided by illegal means through a well-established system. The establishment of these cyber laws was very important as

they are connected to almost all the activities or actions that take place on the internet. In view of its importance, the United Nations introduced the United Nations Model Law on Electronic Commerce (UNCITRAL), 1996. The Information Technology Act, 2000 which is also known as IT Act was introduced by the Indian Parliament to counter the threats, issues and crimes related to Cyberspace or the Internet. The borderless nature of e-crimes urges some innovative measures to hinder cybercrimes. Apart from Cyber Laws, there is a need to keep in mind some safety points while surfing the internet. One important point is awareness should be made among the students or youth at elementary levels. Students should be provided with the basic idea of cyber related crimes and Cyber Laws. Apart from this, cyber literacy should be provided at every level like technological hub or centers, schools, colleges, and universities. To provide the main idea of internet and internet security, there is a need to formulate cyber law awareness programs in every educational institution like schools, colleges, and universities (Kapila & Pallavi, 2020).

Recent study specified that today social media plays an important role in the life of people. It has now become a main mode of communication where people are connected through social media sites or apps. To stay in touch with their friends, to stay updated with current events and news, and to get entertainment in their free time, people use many social media platforms. Apart from this, they also share photos or videos, promote businesses, and buy online products, etc. This recent emergence of social media paved way for many criminal activities and hence people need to use preventive methods to enhance the security of their social media accounts. People should not click on unsecured links or open unsecured attachments, should not access unsecured Wi-Fi networks and lastly should not share their passwords with friends (Sumro & Hussain, 2021).

The easiest and quickest way to connect and communicate with people are different social networking sites, messaging apps and mailing services that help to stay in touch from anywhere to everywhere. Particularly teens spend more time on computers or electronic devices. They believe that the internet improves their friendship. It can be calculated as the main reason social networking sites are becoming more popular among youth. This popularity of social networking sites among youth delivered a new way of cybercrimes in their lives (Rauta, Rao, Saini, Panda, et al., 2020) It was determined that joining and taking part in online forums and communities signifies and indicates the fact that young people and generations are becoming victims of cyber threats and crimes. As the youth has no or very low experience in risk management when such crimes are executed against them, they are at a high-risk level becoming the victims of these crimes. Therefore, it very essential to teach them about the risk associated with the internet (Holt & Bossler, Helweg-Larsen et al., 2012).

Today the internet has become the one and only source of fulfilling decisive social needs and it has now changed our lifestyle. For common people using social sites for entertainment purposes or for getting knowledge is now a part of their day-to-day life but for some malicious people victimizing such people is their routine. As most of the youth use some social sites and other dating apps they get involved in risky communication and the process

of victimizing starts when activities like sharing personal information are involved (Engström Sumter, Sánchez, et al., 2020).

To avoid different types of cybercrimes, it is very important to be watchful while sharing personal information on social sites or apps. Uploading any personal information or data on social sites can be recognized as attention-seeking behavior and being alert and safe while doing these activities can add up towards a small step in preventing social media crime (Yassir & Nayak 2012; Wadhwa & Arora, et al., 2015).

Different laws are also constituted to prevent cybercrimes and punish the one who commits such crimes. One such law includes punishment for a person who transmits or publishes material like video or picture interpreting or presenting children in sexual assault or activities in any electronic form will be punished under section 67A of the Information Technology Act of India, 2000 Here, the culprit will be imprisoned for either to 5 years with fine or this could even extend.

As youth is centered on internet-related crimes, this may include crimes like offensive messages, where the intention is dangerous and language sounds like an insult, obstruction, criminality or any of the similar kind. If such a message is sent through any electronic media like emails or text messages, the culprit is punished under Section 66A of the Information Technology Act of India, 2000 in which punishment includes imprisonment up to three years with a fine. There are as many laws as there are crimes in the cyber world but the important thing here is the awareness about these crimes and laws made to prevent such crimes. Therefore, it is very important for everyone to have an underlying knowledge of cyber and cyber security. For improving this knowledge, one should go through cases related to cybercrimes. To prevent from crimes happening in the internet world one should use applications and sites that are trusted, and the most considerable act one can do is to be protective while sharing any kind of personal information (Animesh, Roshmi, et al 2017).

As digitization is enjoyed by the young generation, this group is more affected by digital threats. To protect every group of society not only the government but many non-governmental organizations are working closely and responsibly. Also, there are those companies that develop different technologies to work effectively to protect their customers and users from security theft. One such system is two-factor verification, In this system an individual is identified based on the combination of two different components. A few years ago, Facebook launched a Facebook threat exchange to protect this platform from cybercriminals.

Objectives

1. To determine the various factors contributing to cybercrimes in India.
2. To ascertain the impact of cyber law awareness on cybercrime.

Methodology

The present study is exploratory in nature. In this study, the conclusions have been drawn based on primary data. In the first phase of the study, extant literature was reviewed and a survey instrument was developed based on the inputs from the literature to support the content validity of the questionnaire. The study had considered sample of 228 respondents to conduct the study survey and explore the factors that determine cybercrime as well as awareness among youth about cyber law. The researcher also studied the impact of cyber law awareness on cybercrime. The data of this empirical study was collected through 'random sampling method.' The data was analyzed by Exploratory Factor Analysis and Multiple Regression Analysis to get the results. Exploratory Factor Analysis (EFA) operates without discriminating between variables as independent or dependent; instead, it functions as an interdependence technique devoid of formal hypotheses. The 'exploratory' nature of EFA becomes apparent in its capacity to enable researchers to identify underlying dimensions or factors within a given dataset (Haig, 2005). This method proves particularly valuable in managerial or academic research, facilitating the consolidation of items into distinct dimensions that can be totaled or aggregated (Hooper, 2012). The resultant composite measures can then serve as input for subsequent multivariate analyses like multiple regression. Moreover, EFA finds widespread application in scale development research, where it efficiently condenses extensive item pools into a more concise, reliable, and conceptually sound measurement instrument.

Findings of Study

Table 1 shows the respondents' general details, where in 228 respondents 68.4% are males and rest 31.6% are females. Among them 31.1% are below 25 years of age, 40.8% are between 25-35 years of age and rest 28.1% are above 35 years of age. 70.2% of the respondents are graduates and below and 29.0% are postgraduates and above. 24.6% of them are salaried, 12.7% are in business, 26.3% are self-employed and 36.4% means majority of them are students.

Table 1: General Details

Variables	Respondents	Percentage
Gender		
Male	156	68.4
Female	72	31.6
Total	228	100
Age (years)		
Below 25	71	31.1
25-35	93	40.8
Above 35	64	28.1
Total	228	100
Educational Qualification		
Graduates and below	160	70.2
Post Graduates and above	68	29.8
Total	228	100
Occupation		
Salaried	56	24.6
Business	29	12.7
Self employed	60	26.3
Student	83	36.4
Total	228	100

Extraction of Factors on Cybercrimes, Awareness of Youth and Cyberlaws

Exploratory Factor Analysis

KMO value found is .867 (Table 2).

Table 2: “KMO and Bartlett's Test”

Kaiser-Meyer-Olkin Measure of Sampling Adequacy		.867
Bartlett's Test of Sphericity	Approx. Chi-Square	2514.791
	df	153
	Sig.	.000

Table 3 shows that all the 4 factors contribute to explain a total of 68.989 % of the variance. The variance explained by Internet-related crimes is 41.666 % followed by Solutions to avoid cybercrime with 10.525 %, third Factor (Reason of cybercrime) having 8.604 % and fourth factor (Awareness about cybercrimes and Cyber laws) explains 8.194 % of variance.

Table 3: “Total Variance Explained”

“Component”	“Initial Eigenvalues”			“Rotation Sums of Squared Loadings”		
	“Total”	“% Of Variance”	Cumulative %	“Total”	“% Of Variance”	Cumulative %
1	7.500	41.666	41.666	7.500	41.666	41.666
2	1.894	10.525	52.191	1.894	10.525	52.191
3	1.549	8.604	60.795	1.549	8.604	60.795
4	1.475	8.194	68.989	1.475	8.194	68.989
5	.884	4.910	73.899			
6	.737	4.097	77.995			
7	.621	3.449	81.444			
8	.484	2.691	84.135			
9	.464	2.575	86.711			
10	.399	2.214	88.925			
11	.342	1.901	90.827			
12	.337	1.871	92.697			
13	.297	1.650	94.347			
14	.286	1.589	95.936			
15	.230	1.278	97.215			
16	.214	1.190	98.405			
17	.180	.998	99.403			
18	.107	.597	100.000			

Figure 1 presents the eigenvalues of the factors.

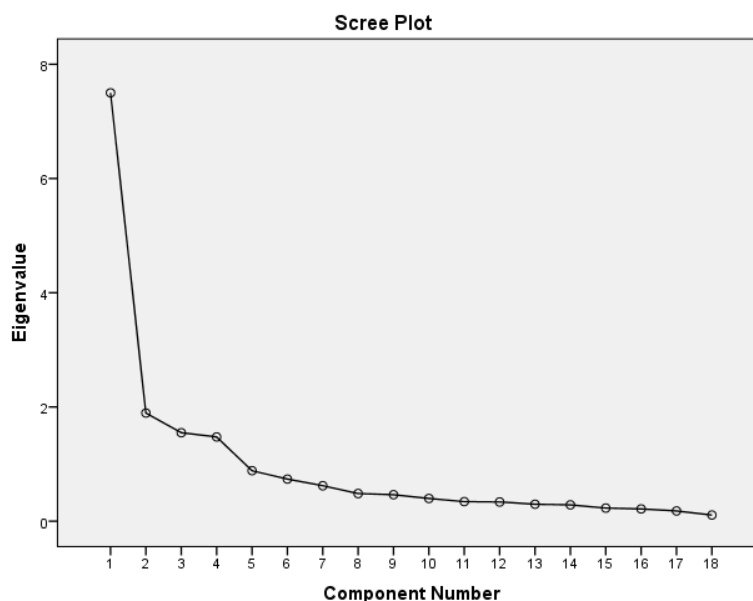


Figure 1: Scree Plot

Table 4 presents the extraction of the factors, factor loadings and factor wise reliability statistics (Cronbach's Alpha). First factor is named as Internet-related crimes which includes the variables like Sending offensive messages through electronic media, Transmitting or publishing video or picture that interpret or present children in sexual assault in electronic form, Sexual solicitation through online means of communication, Cyber bullying by young people on internet and Software pirating and corporate espionage. Second factor is Solutions to avoid cybercrime and its associated variables are Teaching young students and making them aware of cyber security issues, cyber laws and crimes, using applications and sites that are trusted, Protective while sharing any kind of personal information, Cybercrime awareness and prevention courses must be an elemental part of training and Avoid attention-seeking behavior by uploading any personal information or data on social sites. Third factor is Reason of cybercrime which includes the variables like Unsecured links or open unsecured attachments, Unsecured Wi-Fi networks and sharing passwords with friends, Sharing personal details and Easy money, no jobs or source of earning. Fourth factor is Role of Cyber laws in Reducing Cybercrimes, Awareness about cyberlaw will reduce cybercrime, Cyberlaw campaigns by government will reduce Cybercrimes, Mandatory subject about cyber laws in schools and colleges will help in reducing Cybercrime and Community building against Cybercrimes will reduce Cybercrimes.

Table 4: Factors, Factor Loading and Reliability

S. No.	Statements	Factor Loading	Factor Reliability
	Internet Related Crimes		.858
1.	Sending offensive messages through electronic media	.795	
2.	Transmitting or publishing video or picture that interpret or present children in sexual assault in electronic form	.749	
3.	Sexual solicitation through online means of communication	.735	
4.	Cyber bullying by young people on internet	.711	
5.	Software pirating and corporate espionage	.694	
	Solutions to Avoid Cybercrime		.816
6.	Teaching young students and making them aware of cyber security issues, cyber laws and crimes	.870	
7.	Using applications and sites that are trusted	.835	
8.	Protective while sharing any kind of personal information	.792	
9.	Cybercrime awareness and prevention courses must be an elemental part of training	.566	
10.	Avoid attention-seeking behaviour by uploading any personal information or data on social sites	.508	
	Reason of Cybercrime		.873
11.	Unsecured links or open unsecured attachments	.871	
12.	Unsecured Wi-Fi networks and sharing passwords with friends	.836	
13.	Sharing personal details	.807	
14.	Easy money, no jobs or source of earning	.622	
	Role of Cyber laws in Reducing Cybercrimes		.857
15.	Awareness about cyberlaw will reduce cybercrime	.824	
16.	Cyberlaw campaigns by government will reduce cybercrimes	.778	
17.	Mandatory subject about cyber laws in schools and colleges will help in reducing Cybercrime	.751	
18.	Community building against cybercrimes will reduce Cybercrimes	.738	

Table 5 shows the overall reliability of 18 items that includes the variables related to cybercrime and cyber law awareness is 0.914.

Table 5: Reliability Statistics

Cronbach's Alpha	N of Items
.914	18

Impact of Factors determining Cybercrimes and on the Role of Cyber laws in Reducing Cybercrimes

In this study, the Impact of Factors Determining Cybercrimes on Role of Cyber laws in Reducing Cybercrimes has been ascertained with the help of “Multiple Regression Analysis”. In the model summary the value of Adjusted R square is 0.587 with 53% of the variation (Table 6).

Table 6: “Model Summary”

“Model”	“R”	“R Square”	“Adjusted R Square”	“Standard Error of Estimate”
.735 ^a	.540	.532	.58769	.735 ^a
IDV: Internet-related crimes, Solutions to avoid cybercrime, Reason of cybercrime and Awareness about cybercrimes & Cyber laws				

Dependent variable is influenced significantly by at least 1 variable as the significant value less than 0.05 (Table 7).

Table 7: “ANOVA^a”

“Model”	“Sum of Squares”	“df”	“Mean Square”	“F”	“Sig.”	
1	“Regression”	90.571	4	22.643	65.558	.000 ^b
	Residual	77.021	223	.345		
	Total	167.592	227			
DV: Role of Cyber laws in Reducing Cybercrimes						
b. Predictors: (Constant), Internet-related crimes, Solutions to avoid cybercrime, Reason of cybercrime and Awareness about cybercrimes & Cyber laws						

The independent variables or factor determining the cybercrimes - Internet-related crimes, Solutions to avoid cybercrime, Reason of cybercrime and Awareness about cybercrimes & Cyber laws- all the factors are showing significant impact on Role of Cyber laws in Reducing Cybercrimes. Highest impact is shown by Solutions to avoid cybercrime with beta value 0.689 followed by Awareness about cybercrimes & Cyber laws (0.215), Reason of cybercrime (0.106) and Internet-related crimes with beta value 0.092 (Table 8).

Table 8: “Coefficients^a”

“Model”	“Unstandardized Coefficient”		“Standardized Coefficients”	“t”	“Sig.”
	“B”	“Std. Error”	“Beta”		
(Constant)	3.724	.039		95.673	.000
Internet-related crimes	.079	.039	.092	2.026	.044
Solutions to avoid cybercrime	.592	.039	.689	15.178	.000
Reason of cybercrime	.091	.039	.106	2.328	.021
Awareness about cybercrimes & Cyber laws	.184	.039	.215	4.726	.000
DV: impact of cyber law awareness on cybercrime					

Conclusion

Today technology has become an integral part of our daily life. Most people are living in the world of the internet or cyberspace. Though the internet has numerous advantages, it has brought many threats too. These threats are called Cybercrimes, e-crimes, or Hi-tech crimes. To prevent being trapped in such crimes it is very important to take some preventive measures. Firstly, it is very important to have some basic knowledge of specific laws related to cybercrimes called Cyber Laws. The majority of the population struck with the internet today belongs to the youth class and also, they are more prone to internet crimes. It is necessary to make them aware of the internet's realities. Here, parents and teachers can play a vital role in implementing awareness programs on cyber linked crimes and prevention against them. Such programs will empower the youth against these Hi-tech crimes. It is also noted that many organizations are working at national and international level to protect individuals from digital crimes. Many are even working closely to help those who became victims of these crimes. It is a noted fact that most of the youth spend most of the time on social media and related websites and applications. These websites and applications can be used as a vital source to spread awareness among the youth regarding cyber issues and crimes related to the internet. Government and government-linked agencies can act as an interferer to not only expand the information of Cyber Laws on social media, but they can also take help from schools,

colleges, and universities to encourage teens to take interest in cyber-related issues and contact them immediately if they feel they have become the victims of e-crimes. Where the internet today is seen as a source of crime for some people, it is also used as tool by various agencies to catch the culprits who are committing crimes using electronic media and internet sources. It is found through the study that Internet-related crimes, Solutions to avoid cybercrime, Reason of cybercrime and Awareness about cybercrimes & Cyber laws are the factors that determines Role of Cyber laws in Reducing Cybercrimes.

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