



INFORMATION POLICY DEVELOPMENT AND ITS IMPACT ON ORGANIZATIONAL SUSTAINABILITY, EFFICIENCY AND PRODUCTIVITY

STEPHEN ONYEANWUNA OSAKWE^{1*}, HENRY OGHENEVWAIRE UDORO²,
GODSPOWER AKWAKPORIERIE³

^{1,2,3} Department of Office Technology and Management
Delta State Polytechnic, Otefe-Oghara

Corresponding Author: steveosakwe1212@gmail.com

To cite this article (APA): Osakwe, S. O., Udoro, H. O., & Akwakporierie, G. (2024). Information policy development and its impact on organizational sustainability, efficiency and productivity. *AAU Journal of Business Educators*, 4(1), 305-318

Abstract

This paper examined the impact of information policy development on organizational sustainability, efficiency, and productivity in some selected business organizations in Port Harcourt metropolis, Rivers State. It also examined the issues of the right tools, software to be applied with special emphasis on the size, scope of the organizations, the efficient management of information policy, the rightful use and application of censorship. A survey research design was employed in this study in which questionnaires was designed and interview was conducted to elicit information from various respondents. A sample size of twenty (20) employees comprising heads of administration, commutation, and personnel was derived using Taro Yamen's formula. The data collected from respondents was analyzed using percentage and regression statistics. It was recommended among others that business organizations should endeavour employ an effective and efficient management strategy and system, which will, in turn, influence positive result in the long run through trust, retention, sustainability, proficiency and productivity of the organizations.

Keywords: *Business Organizations, Information Policy Development, Organizational Efficiency, Organizational Productivity, Organizational Sustainability.*

Introduction

Information in the present global system is a crucial and a major key factor in all business activities of human endeavor as its scope cuts across to our civil and private life in the society. At the present technological and global economy, no organization, corporation, institution, agencies, and in our personal endeavor can survive without information. Alan (2016) opined that the role of information has grown so enormous such that organizations now show more concern on information than productivity. This implies that information as a major role player is a resource tool for controlling and regularizing the business activities of the organization. With information, the supply chain of a business activity could be effectively managed to the expectation and policy goals of the organization. This is also applicable to other sectors or departments of the organization, such as the marketing department responsible for sales and customer satisfaction and retention. It is also very vital to the innovative and design development unit or department responsible to making sure that products and services of the organization, measures and conform to customers and societal demands and expectation.

Alabraski (2010) argued that information is a vital and a resource tool for the development and success of any organization, without which there will be misinterpretation and unorganized policy management. Information as a tool of control can be used to manage, organize, regulate and operate the smooth flow of work and all the activities of the different departments and workstations in the organization leading to efficient and effective resources management. From this perspective, information could be seen as the life-wire of any organization. Zakki (2012) pointed out that information is the bed rock of any nation, organization, institution etcetera. Ignorance of this; is a total downturn and failure of the policy management of the organization. This is in line with the adage “if you fail to plan, you plan to fail”. Thus, the value of information is indispensable to the success and goals achievement of any organization or institution.

Carelli (2017) opined that information is the key tool upon which organizations lay their foundation, formulate policies, make decision, resource control, and maintain effective, proficient and productive workstations environment either internally or externally. This implies that information is a control mechanism, for controlling the supply chain, purchase, production, sales/marketing, and efficient use of resources of the organization. Thus, information is the only fit-in and fit-out tool for a successful and smooth operation of any business organization. Information policy development is all about how information is gathered, filtered and this policy are formulated and developed to guide the human and capital resources of the organization. While information censorship is focused on how information is restricted or controlled from the employee or the public. Censorship here means information is suppressed either from the employees or the public as the case may e. the impact on organizational sustainability is seen the fact that with a well-structured information, this will improve the proficiency of the organization in decision-making. Thus, where the organization is proficient in its decision making, a greater and prolonged sustainability of the organization is assured. Organizational sustainability implies the life of the organization in business life-cycle. Sustainability is how well the organization is able to sustain its activities in terms of its human and capital resources of the organization. How does it manage the organization’s resources will reflect on the sustainability of the organization within and outside its business life-cycle?

Statement of the problem

In time past organizations, corporations and institutions are not mindful of the strategic nature of information policy development and the application and use of information censorship in their organizations and institutions. This has led to the down-turn and winding up of many of these institutions and organization, thus the problem statement of this research paper is how well can organizations and institutions constantly review strategies on information policy development and how well they apply and make use of information censorship on the workforce. Thus, this problem emanates as a result of the unstable nature of Nigeria’s economic and political environment coupled with government apathy towards information services and the neglect of target beneficiaries and lack of consideration of policy environment. It is based on this precarious situation that the authors decided to examine the impact of information policy development and censorship on organizational productivity.

Objective of the Study

The purpose of this paper was to examine the impact of information policy development on the sustainability, efficiency, and productivity of some selected business organizations in Port Harcourt metropolis of Rivers State. Specifically, the study sought to examine:

1. The impact of information policy development on organizational sustainability.

2. The impact of information policy development on organizational efficiency.
3. The impact of information policy development on organizational productivity.

Research Questions

The following research questions guided the study.

Research Question 1: To what extent does information policy development impact organizational sustainability?

Research Question 2: To what extent does information policy development impact organizational efficiency?

Research Question 3: To what extent does information policy development impact organizational productivity?

Research Hypotheses

The following null hypotheses were tested at 0.05 level of significance.

Research Hypothesis 1: Information policy development does not significantly have impact on organizational sustainability in some selected business organizations in Port Harcourt metropolis in Rivers State.

Research Hypothesis 2: Information policy development does not significantly have impact on organizational efficiency in some selected business organizations in Port Harcourt metropolis in Rivers State.

Research Hypothesis 3: Information policy development does not significantly have impact on organizational productivity in some selected business organizations in Port Harcourt metropolis in Rivers State.

Concept of Information

Information is a fact provided or learned about something or someone. It could also mean what is conveyed or represented by a particular sequence of things or an event that is genetically transmitted. Information could also mean a stimulus that has meaning in some context for its receiver. Information could also be seen as the transmission of a signal from the sender to a receiver in a manner that the receiver will receive and understand it as intended by the sender. Signals could mean, sounds, symbols, videos, voice graphics, pictures/images, etcetera which could be verbal or non-verbal depending on the circumstances or situation.

Billy and Barzilal (2012) remarked that information is the summarization of data. Technically, data are raw facts and figures that are processed into information such as summaries and totals. But since information can also be the raw data for the next job or person, the two terms cannot be precisely defined, and both are used interchangeably. Thus, it may be helpful to view information the way it is structured and used, namely: data, text, spreadsheets, pictures, voice and videos. Data are discretely defined fields; text is a collection of words. Spreadsheets are data matrix (row and column) form. Pictures are lists of vectors or frames of bits. Voice is a continuous stream of sound waves. Videos are a sequence of image frames. Thus, the term “information” could be applied in different forms or ways depending on the understanding between the sender and the receiver.

Concept of Information Policy, Information Development and Censorship

Information policy is an overarching statement setting out why information management is mission-critical to the organization and how it sits within a wider organization expression of (organizational) objectives. Policy information or information policy is taken to mean information used in the formulation, design, and selection of public policies. Often it is the result of policy analysis, the objective evaluation of the social and economic implications of changes in public or private organizational policy. (Straf, 2019). The key ingredients of information policy analysis are data, analytical models, including their documentation and validation, and effective communication of the results to policy makers, in particular of the assumptions in models and uncertainty in estimates. Many models are employed in information policy analysis. Micro simulation models, for example simulate how records on individual people or units, such as taxpayers or health care providers, change over time and as a result of a proposed policy.

Barman (2016) opined that information policy is comprised of laws, regulations, and doctrinal positions and other decisions making and practices with society-wide constitutive effects, involving information creation, processing, flows, access, and use. Thus, the concept of information policy comprise the set of all public, and private organizational laws, regulations, and policies that encourage, discourage, or regulate the creation, usage, storage, access, and communication and dissemination of information. The concept of policy development is an iterative process designed to produce continuous improvement in workplace safety and to provide a clear indication of the policymaker's commitment to safety. A workplace safety policy forms the foundation of its larger health and safety programs. Government or regulatory policy development is a fundamentally data-driven process in which the effectiveness (or lack thereof) of existing policies is evaluated and those which are deemed lacking are updated. (Occupational Health & Safety Management, 2019). Information policy development varied by industry, so policy makers will need to determine what rules to apply to the company, thus policy development are the steps taken in order to arrive at such policy. According to Blothan, et al., (2018), there are seven steps to building an information management policy, stating clearly what kind of data should be kept, what kind should be deleted and establish a sound, objective method to apply to company-wide data. They postulated the following steps: Taking inventory of the scope of data and how much disk space is available for storage and archival; identifying the types of records that must be retained; Appointment of records coordinators throughout the company; Institute a strict email retention policy; Kick off and sustain your program with records retention week and periodic audits; Prevent unauthorized data removal or archiving; Implement a BYOD policy to control data stored on personal devices.

Harold (2017) postulated that a popular model of the policy cycle development divided the processes into seven distinct stages, ranging from intelligence, promotion, prescription, invocation, application, termination and appraisal. This process inherently attempts to combine policy implementation to formulated policy goals. James (2012) reported in his Public Policy making has and postulated the following stages: Agenda setting (problem identification) – the recognition of certain subject as a problem demanding further government attention; Policy formulation –involves exploring a variation of options or alternative courses of action available for addressing the problem (appraisal, dialogue, formation and consolidation); Decision making –government or the organization decides on ultimate course of action, whether to perpetuate the policy status quo or alter it. (Decision could be positive, negative, or no-action); Implementation – the ultimate decision made earlier will be put in practice; Evaluation – assesses the effectiveness of a public policy in terms of its perceived intentions and results; whether the course of action is a success or failure, by examining its impact and outcomes.

Procedure for Information Policy Development

Thus, information policy development involves and permeates the entire process of the organization or institution, be it private or public. Policy addresses the intent of the organization, whether government, business, professional, or voluntary, which is intended to affect the “real” world by guiding the decisions that are made. Dafiaghor and Hacking (2011) opined that censorship is based on the use of State or group powers to control freedom of expression or press. This is hinged on the fact that every society has customs, taboos or laws by which speech, dress, religious observance, and sexual expressions are regulated in order to protect the family, church, and the State. Thus, intellectual freedom according to Article 19 of United Nations Universal Declaration of Human Rights is the right to freedom of thought and of expression of thought. Intellectual freedom guarantees everyone the right to freedom of opinion and expression. This right includes the freedom to hold opinions without interference and to seek, receive and impart information and ideas through any media and regardless of frontiers. Intellectual freedom encompasses the freedom to hold, receive and disseminate ideas or information. Whereas censorship is the suppression and or control of ideas and information that individuals, groups, or government officials find objectionable or dangerous. This is usually achieved through state powers via public institutions such as schools, libraries, information centers among others. Moody (2015) claim that censorship is defined as those actions which significantly restrict free access to information. It could be seen as the examination of books, plays, films, television and radio programs, news report, and other forms of communication for the purpose of altering or suppressing ideas found to be objectionable, harmful, or offensive. The general perspective is that censorship is an intentional tool or act to suppress and prohibit freedom of information and speech, freedom of association, freedom of the press, etc. without due procedural consultation of such act.

Jenkins (2018) reiterated that policy is a deliberate system of principles to guide behaviors; decisions and achieve rational outcomes. A policy is a statement of intent and is implemented as a procedure or protocol. Policies are generally adopted by a governance body within the organization. This may apply to government, public sector organizations and groups, as well as individuals, presidential executive orders, corporate private policies, and parliamentary rules of order. This implies that there is no form of human group, association, company, organization, the family, the church, among others where the principles of policy does not exist. It therefore means that where two or more people come together for a common purpose or goal, there must be some sort of policy to regulate and guide them, in order to realize and achieve the purpose of their intent of coming together. Paquette (2012) opined that policy study refers to the process of making important organizational decisions, including identification of different alternatives such as programs or spending priorities, and choosing among them on the basis of the impact they will have. Policies could be understood as political, managerial, financial, and administrative mechanisms arranged to reach, explicit goals. Thus, information policy development, are policies deliberately designed to guide and protect company or organization’s data and information such as access to information, unauthorized removal or updating of information, authorized access to information, and to avoid unnecessary disruption of information flow. Information policy in this perspective could be term “Information Accountability”, this is to know the direction and flow of information; where, when, how, and who sent and received it. Information policies are written in general terms that outline goals, methods, and responsibilities, which describe the precise activities that must be taken to comply with the policy. Information policy developments are data-driven and a procedure or stages by which such policies are developed and implemented. The technique for determining retention criteria is to convene a committee of people throughout the organization. The criteria decided by the committee are then subject to final review by company leadership.

Thus, information policy development, implementation, management, and protection are a vital key factor in any company or organization. As certain or specific information are retained and others destroyed or trashed, so certain information are censored, most especially relating to the larger society (Public). Censorship on the other hand when related to information, could be seen as the prohibition, suppression and a denied access to information or restriction of information to the public, believing that such information are harmful or offensive, by altering, suppressing or prohibiting such information. Information censorship is mostly prevalent in social media and news media, where certain information meant for the public are altered, polished, and fine-tuned before broadcasting to the public (Government). Multinational corporations and organizations do sometimes indulge in the act of censorship, as they would not want certain information to be exposed to the knowledge of the employees. The implication of this is that there is no freedom of information. Darffolkand Melvin (2011) argued that freedom of information can be regarded as an offshoot of freedom of expression or speech, which is a fundamental human right recognized in international law or human rights charter. Freedom of information pertains to a citizen or an individual's right to access information that is held by the State or its agent or other organizations that relate to the public and draw its existence from the continued patronage or activities of the populace. However, censorship has been an issue which has been present throughout recorded history. From the beginning, it has been used by individuals and groups to prevent and control the creation, access and dissemination of ideas and information. It has taken many different forms and occurred for many different reasons, it can be prior or post, (Famous & Goode 2011).

Blomsbery (2011) opined that censorship is a very slippery slope and even one small allowance can often result in widespread control of information in totally unforeseen ways. Censorship is pressed by forces both external (parents, religious, groups, political groups, minorities, patriotic groups, emotionally unstable individuals) and internal (administrators, government bodies, personnel, selection or circulation policies). These sources of censorship vary with the type of information. Famous and Goode (2011) submitted that censorship can be prior or post. Prior censorship – this is when an information material is being barred or censored before publication. This may be done by publishers, government and its agencies, organizations, individuals, religious or other associations, among others and may be done by force or negotiations. Post censorship – this is when an information is banned or censored after it has been published. Some good examples are the banning of Tell Magazine Publications during the military regime of Genral Sanni Abacha and the banning of Satanic verses novel in 1989 written by Salman Rushdie in which a gloval death sentence was placed on the author by the late spiritual leader of Iran Ayatollah Ruhollah Khomeini but in 1998, the succeeding government of Iran under the leadership of Mohammad Khatami lifted the death sentence. Dafiaghor and Hacking (2011) identified the following types of censorship usually carried out in Nigeria as, moral censorship, military censorship, political censorship, religious censorship, and corporate censorship.

Theoretical Framework

The theoretical framework of this research paper is based on the theory of Gate-keeping instituted by Kurt Lewin in 1943. This theory postulate the process of controlling information as it moves through a gate. Activities include among others, selection, addition, withholding, display, channeling, shaping, manipulation, repetition, timing, localization, integration, disregard, and deletion of information. And the Network gatekeeper, as entity (people, organizations, institutions, or government) that has the discretion to exercise Gate-keeping through a Gatekeeping mechanism in networks and can choose the extent to which to exercise it is contingent upon the gated The gate-

keeping theory is related to this study as the study deals with the implementation of information and the life-cycle of information.

Methods

Research Design

The study adopted a survey research design to achieve the purpose of the study. Survey research designs (also referred to a quantitative research design) utilizes instruments such as questionnaires and interviews to gather information from groups of individuals (Ary, Jacobs, Sorensen & Walker, 2014). Survey research designs was suitable for this study, in that it allows the authors to describe the opinions of employees in business organizations.

Data Collection Instrument

Primary source of data was generated through a structured questionnaire.

Population and Sampling Procedure

The population of the study comprised of 25 employees (that is, heads of administration, commutation and personnel) randomly selected from some business organizations in Port Harcourt metropolis, Rivers State. As a result, 25 copies of questionnaire were distributed to these office employees. Out of this 25 copies of questionnaire distributed, 20 copies were returned and were used for data analysis.

Reliability and Validation of Data Collection Instrument

The instrument was re-tested and within the respondents and the re-test proved same, hence the reliability of the study was certified. The research was validated as it measured what it was supposed to measure.

Data Analysis

The Statistical Package for Social Scientist (SPSS) was use to analyze the data collected from the respondents. The data collected was analyzed using descriptive and inferential statistics. The hypotheses were tested using the chi-square statistic at a 0.05 level of significance.

Result

Answering Research Questions

Research Question 1: To what extent does information policy development impact organizational sustainability?

Research Question 2: To what extend does information policy development impact organizational efficiency?

Research Question 3: To what extent does information policy development impact organizational productivity?

Table 1: Organizational Sustainability, Organizational Efficiency and Organizational Productivity

S/N	Variables	Research Questions	Response (Optional)	Male	Female	Percentage %	Row Total
1	Organizational Sustainability	Does information policy development have impact on organizational sustainability?	Yes	10	06	80	16
			No	02	02	20	04
			Total	12	08	100	20
2	Organizational Efficiency	Does information policy development have impact on organizational efficiency?	Yes	06	02	40	08
			No	09	03	60	12
			Total	15	05	100	20
3	Organizational Productivity	Does information policy development have impact on organizational productivity?	Yes	12	08	100	20
			No	-	-	-	-
			Total	12	08	100	20

Hypotheses Testing

Research Hypothesis 1: Information policy development does not significantly have impact on organizational sustainability in some selected business organizations in Port Harcourt metropolis in Rivers State.

From table 1 above, to get the frequency expected the following formula was used.

$$Fe = \frac{\text{Row total} \times \text{Column total}}{\text{Grand total}}$$

Grand total

$$Fe \text{ for } 10 = \frac{16 \times 12}{20} = 9.6$$

20

$$Fe \text{ for } 6 = \frac{16 \times 8}{20} = 6.4$$

20

$$Fe \text{ for } 2 = \frac{4 \times 12}{20} = 2.4$$

20

Fe for 2= $\frac{4 \times 8}{20} = 1.6$

20

The Chi-square formula was applied = $\sum \frac{(fo - fe)^2}{fe}$

Fo	F e	F o	(Fo - Fe) ²	X ² = ∑ (f o - f e) ² fe
10	9.6	F	0.16	2
6	6.4	-	-0.16	1
2	2.4	-	-0.16	1
2	1.6	0.	0.16	1
			Calculated value	5

To get the Degree of freedom (df), the authors apply the following formula:
(Row -1) (Column -1)

= (2-1) (2-1)

= 1 x 1 =1

Level of significance = 5% (0.05)

Degree of freedom 1 at 5% level of significance = 3.841

Table value = 3.841

Decision – since the calculated value of 5 is greater than the table value of 3.841, we reject the null hypotheses and accept the alternate hypothesis, meaning there is a significant relationship between Information Policy Development and organizational sustainability.

Research Hypothesis 2: Information policy development does not significantly have impact on organizational efficiency in some selected business organizations in Port Harcourt metropolis in Rivers State.

From table 1 above to get the frequency expected the following formula was used.

$$Fe = \text{Row total} \times \text{Column total}$$

Grand total

$$Fe \text{ for } 6 = \frac{8 \times 15}{20} = 6$$

20

$$Fe \text{ for } 2 = \frac{8 \times 5}{20} = 2$$

20

$$Fe \text{ for } 9 = \frac{12 \times 15}{20} = 9$$

20

$$Fe \text{ for } 3 = \frac{12 \times 5}{20} = 3$$

20

The Chi-square formula was applied = $\sum \frac{(fo - fe)^2}{fe}$

Fo	F e	F o	(Fo - Fe) ²	X ² = ∑ (f o - fe) /fe
6	6	F e	0	0
2	2	0	0	0
9	9	0	0	0
3	2	1	1	0
			Calculated value	1

To get the Degree of freedom (df) we apply the following formula:

$$(Row - 1) (Column - 1)$$

$$= (2-1) (2-1)$$

$$= 1 \times 1 = 1$$

Level of significance = 5% (0.05)

Degree of freedom 1 at 5% level of significance = 3.841

Table value = 3.841

Decision – since the calculated value of 1 is lesser than the table value of 3.841, we accept the null hypotheses and reject the alternate hypothesis, meaning there is no significant relationship between information censorship and organizational efficiency.

Research Hypothesis 3: Information policy development does not significantly have impact on organizational productivity in some selected business organizations in Port Harcourt metropolis in Rivers State.

From table 1 above to get the frequency expected the following formula was used.

Fe = Row total x Column total

Grand total

Fe for 12 = $\frac{20 \times 12}{20} = 12$

20

Fe for 8 = $\frac{20 \times 8}{20} = 8$

20

Fe for 0 = $\frac{0 \times 12}{20} = 0$

20

Fe for 0 = $\frac{0 \times 8}{20} = 0$

20

The Chi-square formula was applied = $\sum \frac{(fo - fe)^2}{Fe}$

Fo	F e	F o	(Fo – Fe) ²	X ² = ∑ (f o = fe) /2 fe
12	1 2	F e	2	3
8	8	1	2	3
0	0	0	0	0
0	0	0	0	0
			Calculated value	5

To get the Degree of freedom (df) we apply the following formula:

(Row -1) (Column -1)

$$= (2-1) (2-1)$$

$$= 1 \times 1 = 1$$

Level of significance = 5% (0.05)

Degree of freedom 1 at 5% level of significance = 3.841

Table value = 3.841

Decision – since the calculated value of 5 is greater than the table value of 3.841, we reject the null hypotheses and accept the alternate hypothesis, meaning there is a significant relationship between information policy development and organizational productivity.

Discussion

Based on the data analyzed on this research paper, the following findings were deduced. Hypothesis 1 is based on the relationship information policy develop and organizational sustainability. From the data gathered through the questionnaire, 16 respondents representing 80% of the total respondents agree that effective information policy development is significant to the sustainability of the organization. While 10 respondents representing 20% of the total respondents disagreed. From the above analysis it is shown that information policy development has a significant relationship with the sustainability of the organization.

Hypothesis 2 is based on the relationship between information censorship and the efficiency of the organization. From data collated in table 1 above, 8 respondents representing 40% agreed, while 12 respondents representing 60% disagreed that information censorship has no significant relationship with the efficiency of the organization. From the above analysis it shows that there is no significant relationship between information censorship and organizational efficiency.

Hypothesis 3 is based on the relationship between information policy development and the productivity of the organization. From data collated in table 1 above, 20 respondents representing 100% of the total respondents agreed that information policy development has a significant relationship with the productivity of the organization. While none of the total respondents disagreed. This implies that there is a significant relationship between information policy development and organizational productivity.

Conclusion

In conclusion, this research paper has been able to examine issues on information policy development and censorship as it impacts on the sustainability of organization, its contributions and dissatisfaction to the sustainability, efficiency and productivity of organizations. Its components and what it takes to have an effective and functional information policy system in place. Thus, if properly managed it would lead to an impeccable success of the organizations.

Recommendations

Based on the findings of the study, it was recommended that:

1. Business organizations should endeavour to imbibe the culture of periodically and structurally reviewing their information policy strategic development as the global system and its contents are evolving at a geometrical progression to suit the demands and goals of their content.
2. Business organizations should endeavour to improve on their information policy development strategy as it plays a major role in meeting institutional goals and objectives.

References

- Alan, C.U., & Associates (2016). *From control to drift: The dynamics of corporate information policy and infrastructures*, Oxford University Press Oxford.
- Alabraski, J. I., (2010), Inter organizational systems: An information society opportunity or threat. *The Information Society* 3 (3), 55-81.
- Ary, D., Jacobs, L. C., Sorensen, C. K., & Walker, D. A. (2014). *Introduction to research in education* (9th Ed.). United States: Wadsworth, Cengage Learning.
- Barman, M., (2016), Beyond gatekeeping: The normative responsibility of internet intermediaries. *Vanderbilt Journal of Entertainment and Technology Law*, 18 (4), 783-849.
- Billy, J., & Barzilal, N. (2012). Toward a theory of network gatekeeping: A framework for exploring information control. *Journal of the American Information Science and Technology*, 59 (9), 1-20.
- Bloomsberry, J. F. (2011), *The immigrant press and its control*. New York. Harper and Brothers. ISBN 9780837128870 "Park Immigrant Press". Retrieved from <https://archive.org/details/immigrantpressa00parkgoog>.
- Blothan, J., Reich, B.H., & Benbasat, I., (2018). Measuring the linkage between business and information governance objectives. *MIS Quarterly*, 20 (1), 55-81.
- Carelli, J. O., (2017). *A new path for political gatekeepers*. *Reflective Democracy Campaign*. Retrieved from <https://wholeadsus/work/holding-gatekeeper-accountable>.
- Dafiaghor, J., & Hacking, I. (2011). *Representing and intervening: Introductory topics in the philosophy of natural science and information policy development*. Cambridge: Cambridge University Press.



- Darffolk, J., & Melvin, M. (2011). *Mass communication theories: Explaining origins, processes, policies, and effects*. Allyn and Bacon Press.
- Famous, M. N., & Goode, L., (2011). Social news, citizen journalism, policies and democracy. *New Media and Society* 11 (8), 1287-1305.
- Harold Lasswell's, (2017). *Developing a security policy – Overcoming those hurdles*. Retrieved from <http://www.sans.org/rr/paper.php?id=915>.
- James, C. J. (2012). *Security and policy as a key business enabler*. Retrieved from <http://www.scrmagazine.com/scrmagazine/sc-online/2001article/035/article.html>.
- Jerkins, J. L., (2018). *The cognate role of policy and information in public and private organizations*. University of Chicago, University Press Chicago, USA.
- Moody, C. W. (2015). *Public key infrastructure: Certificate policy formulation and certificate practices framework*. London Press.
- Occupational Health and Safety Management (2019).
- Paquette, T. F. (2012). Policy development and managerial accountability. *Journal of the American Information Science and Technology*, 69(8). 35-42.
- Peter, A. E., & Codd, E. F. (2019), A relational model for information policy formulation and development. *Communications of the ACM*, 13, 6.
- Straf, C. A., (2019). *Pitfalls in human research: Ten pivotal points*. New York: Permagon Press.
- Zakki, J. A. (2012). *The science of human sociology and policy development (2nd Ed.)*. New York: Schocken.