## ZAKATECH STRATEGY IN DEVELOPING INCLUSIVE ISLAMIC SOCIAL FINANCE IN INDONESIA

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#### Abstract

Badan Amil Zakat Nasional (BAZNAS) as a sharia social financial institution offers the latest technology in the process of socialization, service and zakat fundraising. The new model offered is ZakaTech, an online payment model that makes it easier for a muzaki (zakat payer) to fulfill his or her responsibility to pay zakat in the midst of the covid-19 pandemic. In addition, the distribution of zakat funds using ZakaTech method is considered very effective in helping mustahik, especially helping the poor who are economically affected by the covid-19 pandemic. This paper aims to analyze the strategy of developing zakat model with Interpretative Structural Modeling (ISM) approach. The results show that the main strategy needed in terms of developing ZakaTech is the ability of human resources (amil zakat) in managing and analyzing data in the era of big data using digital services. The main elements involved in ZakaTech development in Indonesia include the government as a regulator, educational institutions (including universities), and existing industries (pentahelix).

Keyword : Zakat Technology, Intepretatif Structural Modelling, Islamic Social Financing, Pentahelix

### Introduction

Around the world, the era of the COVID-19 pandemic (global pandemic) is affecting economic life. If this is not overcome, it will affect the rise of the poor. World Bank economists talk about it based on calculations of economic data. In fact, he said the poor are one of the categories most vulnerable to coronavirus infection. (Nurhidayat, 2020: 735).

March 2020 According to Indonesia's Central Bureau of Statistics (BPS), there were 24.7 million (26.42 million) poor people between 2019 and March 2020. If the coronavirus problem is not addressed, the poverty rate will continue to rise in 2020. This is due to the weakening of the economy. So, along with this, the poverty rate will rise, and the coronavirus that does not subside will have an impact on the rise in Indonesia's poverty rate.

As a result, Indonesia's poverty rate continues to rise. Another impact of the spread of the corona virus is a massive wave of layoffs due to the weakening economic situation. INDEF research report concludes coronavirus could lead to layoffs. This is due to a -5.32% decline in economic growth in the second quarter and is expected to be -3% in the third quarter. According to the International Labor Organization (ILO), the coronavirus will destroy 24.7 million jobs worldwide. Low scenario - 5.3 million; Medium-term scenario - 13 million jobs. Of these, 7.4 million live in high-income countries, and 6.7% of their working hours are lost.

Anticipating these challenges, zakat institutions (Baznas and LAZ) must continue their efforts to contribute to predicting the impact of coronavirus spread. Preventive measures include educating the public about the importance of a healthy lifestyle. Healing activities are carried out in zakat institutions (Baznas and LAZ) which ready to serve those affected by the Crown and to provide consumer care in an effort to meet the needs of the poor affected by the corona virus. Also, the introduction of quarantine will put the zakat agency at the forefront of serving the community.

Also, most importantly, the institutions involved in zakat (Baznas and LAZ) should be able to innovate in zakat collection, including the use of zakat. This is because the lack of zakat affects the minimal benefits of zakat that community experiences. Therefore, as the high potential of zakat in Indonesia is an opportunity for BAZ and LAZ to raise as much funds as possible for zakat, a new strategy for collecting zakat is the solution. Of course, managing zakat requires the right strategy (for this, the author calls pentahelix the concept of moderators of operators and moderators of supervisors. Some of the approaches used to formulate the right development strategy are based on the Analytical Structural Modeling (ISM) approach.

Zakat Strategic Studies were conducted by Mohammad Solekh (2020), Lutfianto, Ahmad Mustof (2020), Hasana, Miftahul (2019), Ivan RahmatSantoso (2019), and studies by Tantriana, Disi and Lilik Ramabatti (2018). This shows that the importance of developing a technology-based zakat, especially in the current Covid 19 pandemic, should be applied. To enable the development of this Zakatech in the future, we will provide an overview of the hierarchical policies we will focus on troubleshooting.

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## Methods

The research was conducted at the North Sumatra National Zakat Agency (BAZNAS), LAZ Nurul Hayat Sumatera Utara, UPZ UIN North Sumatra, Academic UIN North Sumatra and the North Sumatra Zakat Community. The research was conducted from August 2020 to completion. This research is descriptive. Researchers describe the research factually and accurately related to ISM. Referring to Sugiyono (2009), research is included in the interpretive group. The research data is interpreted by the researcher. Informants are selected to be data sources, in accordance with the problems being researched. In order to obtain clear, complete, and definite data, as well as interview participants, data were also obtained through questionnaires by participants from the following institutions:

Table 1				
Research Participants				
1. DPS-MUI North Sumatera				
2. Komunitas Zakat North Sumatera				
3. LAZ Nurul Hayat				
4. BAZNAS North Sumatera				
5. UPZ UIN North Sumatera				
6. Akademis				

Source: Questionnaire Participants, 2020

It then uses a strategy method through Analytical Structural Modeling (ISM). ISM is a forwardlooking design methodology used to recognize, study, and generalize multiple correlations between factors that describe a problem, problem, or model (Sage, 1977). ISM expands the complexity of the correlations between them by providing a means for both scholars and researchers to enforce commands on the system elements and generate models (Warfield, 1974). Analytic structural modeling is a decision-making technique that addresses the complexity of situations by juxtaposing and organizing ideas on a visual map. The basic concept of ISM is to use experts and practitioners to create system complexity in some subsystem (element) and build a hierarchical structural modeling of it. ISM is also used to provide an overview of difficult situations and develop strategies for solving problems.

There are several steps to analyzing the ISM method. The first step is to decompose the problem by an expert or practitioner (more versed in the problem being discussed/brainstorming) to identify the idea of the developer organization and better understand the problem in financial technology development. In this discussion, we explore the development strategies and variables used in the ISM model. The second step is the construction of the Self-Interaction Structure Matrix Model (SSIM). The SSIM is constructed with the variables obtained in the decomposition step, and the contextual relationship between the variables is developed and collected into one variable i and variable j. The third step is to transform the V, A, X, and O used for the numbers 1 and 0 to create a Reachability Matrix (RM).

The rules for this substitution are: (a) If entry (i, j) in SSIM is V, entry (i, j) in reachability matrix becomes 1 and entry (j, i) becomes 0 (b) entry (i, j) in SSIM is equal to A, then the item (i, j) in the matrix becomes 0 and the item (j, i) becomes 1. (c) Item (i, j) becomes item (i, j) becomes 1 in SSIM and item (j, i) becomes 1 as well. (d) If the item (i, j) in SSIM is 0, then (i, j) in the item matrix becomes 0 and so does item (j, i). The fourth step is to create a canonical matrix for level identification through iteration. When no more intersections are found, the next step is to generate the resulting model using the ISM software. The resulting model is used to solve the problem. A roadmap for effective organizational development (levels) was also investigated in the model. According to

Marimin (2004), the process of the ISM method is computed according to the transition rule, where SSIM correction is performed until a closed matrix is formed. SSIM modifications require the participation of panelists/experts and special cautions are given only for certain subelements. The revised SSIM results and metrics are being further processed according to the conversion rules. You can also use a computer program to perform matrix transformations for refinement.

The final step is to group the sub-elements into four sectors (Saxena, 1994); Weak Drivers \_ Weak Dependent Variables (AUTONOMOUS), variables in this sector are usually not systemspecific and have a small relationship; Dependent variable of weak driver (DEPENDENT), variable included in this group is independent variable; Strong drivers, highly dependent variables (LINKs), variables in this sector should be carefully studied as their interactions may influence and feedback the system; Strong Driver Weak Dependent Variable (INDEPENDENT) Variables in this sector have a strong effect on the system and greatly determine the success of the program.

## **Result And Discussion**

Islam as a universal religion is very open to the dynamics of the development of human civilization. Technological advances in the economic and financial sectors are no exception. So, zakat like ibadah ma'aliya should still be within Sharia compliant scope even if they use technology. In this regard, Rachman & Salam (2018) recommends that OPZs should be compliant with regulations and standardization in two respects in order to apply sharia-compliant governance. First, it is a technical structure that contains the definition of a contract, administrative costs and zakat calculations. Second, in terms of financial reporting, we must comply with the rules and standards of Sharia Financial Reporting Standards. In addition, in order to strengthen the system, it is necessary to continuously monitor compliance with Sharia,

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develop the system, and manage the Zakat according to the development of financial technology. All elements and agencies involved in zakat development and management in Indonesia should work with the government to formulate short-, medium- and long-term guidelines and goals for zakat governance. If another organization has a zakat development plan, the OPZ must also have a zakat development plan. Ideally, the government would form a special body or ministry to manage the zakat fund for this purpose (Zumrotun, 2016).

Technology is advancing rapidly as we enter the digital age. This rapid development has brought about significant changes in all directions and aspects. It can be said that if BAZNAS survives as a traditional fundraising mechanism in this digital age, it does not make a better contribution and even tends to become less effective. Conversely, if BAZNAS transforms, especially in the field of fundraising, i.e. through the use of technology and digital media, it will have a positive impact on ongoing socialization programs (Rohim, 2019).

By making the most of technology and digital media, BAZNAS socialization program will be able to cover a lot. Therefore, public access to information about zakat on BAZNAS will be wider. The general public also has easy access to information. Technology Zakat Fundraising Strategy: Opportunities and Challenges in the Digital Age (Muhammad Soleh) The events after are the result of disruptive innovation. Rachman & Salam (2018) define disruptive innovation as an innovation that succeeds in changing and transforming an existing system or existing market through a system architecture that emphasizes the aspects of accessibility, convenience and cost savings. As for muzakki, you will feel this ease in terms of paying zakat via BAZNAS.

It should be understood together that the rapid development of today's media actually represents the development of an increasingly advanced and evolving era. At first glance, these developments are felt only on the technical side. But beyond that, the advancements represented by technological advances reflect the evolution of community culture. Based on this phenomenon, BAZNAS should be able to move from traditional mechanisms and methods to digital fundraising when conducting zakat fundraising. Moreover, this phenomenon not only penetrates directly into the world of adultery, but also encompasses the whole of finance that introduces phenomena such as fintech and zaka-tech.

The results of ISM processing for requirement items can be viewed below with the following details:

# Element Identification.

Defines and lists elements for use in the system. Items are derived from research and brainstorming with experts in the field. The cooperative development factor for technology-based financing of zakat or zakatach is described in six sub-factors:

Table 2Research Participants

1. DPS-MUI
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2. Komunitas Zakat

3. LAZ

4. BAZNAS

5. UPZ

6. Akademis

Source: Questionnaire Participants, 2020

# Build contextual relationships with the Structural Self Interaction Matrix (SSIM).

SSIM is a matrix that contains relationships between elements that represent elements of respondents' perceptions of objective elements. Relationships are expressed in the four codes V, A, X, O.

V: The relation of the element Ei to Ej, not vice versa

A: The relationship of the elements Ej to Ei, not vice versa

X: The interrelation between Ei and Ej (can be vice versa)

O: Indicates that Ei and Ej are not related

The results of the VAXO contextual relationship are illustrated in the table below as follows:

No.	E1	E2	E3	E4	E5	E6
E1		Х	V	V	V	V
E2			V	V	V	V
E3				V	V	0
E4					Х	А
E5						А
E6						

Table 3VAXO Pentahelix Institution Element

Source: Data processed, 2020

# Building a Reachability Matrix (RM)

Reachability Matrix (RM) is used to convert codes in SSIM into binary numbers. The Reachability Matrix (RM) is used to obtain the driving power and the dependent power. The codes are converted with the following rules:

If the relationship in SSIM, Ei to Ej = V, then element Eij = 1 and Eji = 0 in RM

If the relationship in SSIM, Ei to Ej = A, then element Eij = 0 and Eji = 1 in RM

If the relationship in SSIM, Ei to Ej = X, then element Eij = 1 and Eji = 1 in RM

If the relationship is in SSIM, Ei to Ej = O, then element Eij = 0 and Eji = 0 in RM

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Then do a transitive analysis. Transitive analysis is performed to make corrections to SSIM with calculations according to the Transivity Rule. Transivity Rule, that is, if element 1 affects element 2, element 2 affects element 3 then element 1 must also affect element 3. RM that has fulfilled the Transivity Rule can be continued by setting a level choice (level partition). The results of driving power and dependent power with the Reachability Matrix (RM) are used to convert the codes in the SSIM into binary numbers and are displayed directly from the transitive results as follows:

Table 4Pentahelix RM and Transitive Element Test								
No.	E1	E2	E3	E4	E5	E6	Drv	Ranking
E1	1	1	1	1	1	1	6	1
E2	1	1	1	1	1	1	6	1
E3	0	0	0	1	1	1	3	3
E4	0	0	0	1	1	1	3	3
E5	0	0	0	1	1	1	3	3
E6	0	0	1	1	1	1	4	2
Dep	2	2	3	6	6	6		

Source: Data processed, 2020

## **MICMAC** analysis

MICMAC analysis is an analysis used to analyze the driving force (driver power) and the dependence power of the variables, so that the results of the analysis can identify which variables are the key variables in the system (Mandal and Deshmukh, 1994). Analyzes were performed with the help of MICMAC software. In the MICMAC analysis the variables will be classified into 4 sectors, namely:

Sector 1 is autonomous factors (weak driver - weak dependent variables)

Sector 2 is dependent factors (weak driver - strongly dependent variables)

Sector 3 is linkage factors (strong driver - strongly dependent variables)

Sector 4 is Independent factors (strong driver - weak dependent variables)

Elements that enter this sector are elements that have strong driving forces and weak dependency. Elements in this sector are the key factors in model development:

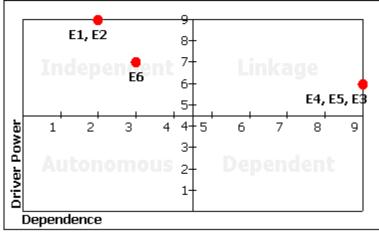


Figure 1. RM Element Pentahelix

### Divide the elements into levels

The division of elements into levels is used to facilitate diagraph creation. The process begins by looking at the reachability set and antecedent set. Reachability set is a set of all elements that can be achieved from the element (Ei). Antecedent set is a set of all elements where the element (Ei) can be achieved. The intersection set was obtained from the Reachability set and the Antecedent set. The first step is to look at elements that have the same reachability set and intersection set, which will be positioned at level one. Elements that enter level one are elements that have no influence on other elements. Elements that already have a level will be eliminated from the table or not used in the next leveling process. The process continues with the same steps until all the elements have their respective levels. Then making the canonical matrix is done by arranging the variables based on the level generated from the partition level, in the form of the final reachability matrix table which is described below:

<u>E4, E5, E3</u>
Û
<u>E6</u>
Û
<u>E1, E2</u>

Figure 2. Level Element Pentahelix

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# Diagraph (Directional graph)

Diagraph is a structural model that describes all elements that are directly related to each other and the hierarchical level. Initial diagraphs are based on a canonical matrix. All transitive components of the initial diagraph are removed to form the final diagraph.

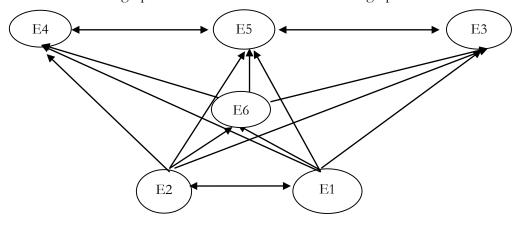


Figure 3 Diagraf Directions 1 Element Pentahelix

Based at the photograph above, the hierarchy that the DSN-MUI (E1) and the North Sumatra Zakat Community (E2) are of specific issue withinside the inclusive improvement of Islamic social monetary institutions.DSN-MUI as a fatwa regulator in Islamic finance operations and the North Sumatra Zakat Community as an evaluator on the adventure of BAZ, LAZ and UPZ to broaden Islamic social monetary institutions. Then Academic (E4) as a drafter who can offer entering to BAZ (E4), LAZ (E3) and UPZ (E5) for the idea and improvement. The outcomes of this paper are consistent with Mohammad Soleh's (2020) writing entitled "Zakat Fundraising Strategy: Opportunities and Challenges withinside the Digital Era." Then, Lutfivanto, Ahmad Mustofa (2020) entitled "Development of Digital-Based Zakat Innovation on the Amil Zakat Infaq and Shadaqah (Inclusive Zakat) Institutions." Hasanah, Miftahul (2019) entitled "Digital Zakat: Technology-Based Zakat Collection in Realizing Sustainable Development Goals (Sdgs)."Ivan RahmatSantoso (2019) entitled "Strategy for Optimizing Zakat Digitalization in Alleviation Poverty withinside the Era of Industrial Revolution 4.0." Tantriana, Deasy, and LilikRahmawati (2018) entitled "The Analysis of Surabaya Muzaki's Preference for Zakat Payment via Zakat Digital Method." This suggests that the significance of technology-primarily based totally zakat improvement should be implemented mainly presently while the epidemic Covid 19.

## Conclusion

The conclusion of this article is that Indonesia zakat institutions (Baznas and LAZ) are currently integrating manual and electronic collection. These two strategies are still mainstream. This is geared towards muzaki subdivision. The muzaki segment in urban areas and the millennial muzaki favor digital fundraising. Based on these results, the authors argue that strategy

development throughZakatech will have a great impact on the development of BAZ, LAZ, and UPZ. Therefore, we focus on DSNMUI and North Sumatera zakat communities, making payments for muzaki and zakat easy while innovating by integrating manual and digital responses to needs, the latter with academia as the founder. The author hopes that this article will make a theoretical and practical contribution. In theory, it is hoped that this article will enrich the literature on the administration of Zakat and the Islamic social system, namely the Zakat system. It is hoped that this document will guide the development of Zakatek's model for the development of Islamic social and financial institutions.

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