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RESEARCH ARTICLE

FOOD HYGIENE AND SAFETY PRACTICES OF FOOD ESTABLISHMENTS

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Abstract

Everyone has an equal right to adequate, appropriate, nutritious, and safe food but along with this right comes a great responsibility which is to ensure food safety for all. Republic Act 10611 otherwise known as the “Food Safety Act of 2013” was signed into law by President Benigno Aquino to strengthen the country’s food regulatory structure. It primarily adheres to the declaration of the Philippine constitution to safeguard and promote the right of the people to health and keep them from risk of trade mismanagement as well as hazardous and unsafe products. The law affirms food safety as a vital component of nation-building to facilitate healthy economy, system, community, and people. On the other hand, altered food safety and security hampers economic development by straining the health care systems, weakening productivity, and damaging the economy. It is therefore imperative to realize the significance of food safety to attain a nation’s sustainable advancement. Nonetheless, there has been less evidence on the status of food hygiene and safety practices of food establishments. Mainly, this study aimed to determine the food hygiene and safety practices of food establishments. In particular, it answered the assessment of the respondents on food hygiene practices of the food establishments along personal hygiene, food preparation practices, safe food storage, and utensils and equipment. Likewise, it identified the food safety practices as perceived by the same groups of respondents in terms of food handling, physical condition, food management system, and health standards implementation. It also investigated if there is a significant difference between the perspectives of the respondents as well as the problems encountered by food establishments. To attain the purpose of this study, a survey type of research was conducted employing a survey-questionnaire as the main instrument in data gathering.

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Introduction:-

Food safety, nutrition, and food security are integrally associated and interrelated (WHO, 2019). Food hygiene and food safety are essential to safeguard the health and avoid health risks that will threaten the well-being of the consumers. In food businesses, it means adhering to processes and practices hygienically while carrying out food tasks. Unsafe food does not only impact human health but adversely affects socioeconomic productivity as well. Many of the food-related crises and problems that most consumers are facing now are not new. Since history was

first recorded, under-reported foodborne diseases have already been an existing health problem that greatly endangers optimum human health and well-being.

The World Health Organization (WHO) estimated that in 2010, 600 million illnesses and 420,000 deaths occurred from consumption of contaminated food (2017). Another study by Azanza, Membrebe, Sanchez et al. (2019) detailed 209 reported Philippines Foodborne Disease Outbreaks (FBDOs) for the period of 2005 up to June of 2018. This portrays that everybody is unprotected to the endless foodborne and food-related health risks if food safety is non-meticulously laid into practice.

In addition, these lengthy crises are worsened by the occurrence of a worldwide pandemic brought about by the Covid-19 Virus. Severe outbreaks of the illness caused by this virus along other food-related illnesses symbolize the present public health status of our society. Consequently, it implies the need for a reinforced social action to grasp the significance of food safety to combat these diseases that have been documented on every continent of the world. The young, elderly, immunocompromised, and poor are the sectors who are most unprotected and susceptible to these hazards. Moreover, it does not only disturb people's health and well-being, but also partakes unfavorable economic effects for individuals, families, communities, industries, countries, and the world at large.

Furthermore, this Covid-19 pandemic is one of the major challenges in food safety validation system to determine the food hygiene and safety practices of these food establishments. During this time of the pandemic, the Government's focus is diverted and divided thus, causing restricted time for monitoring to ensure food safety among these food establishments.

Objectives:-

Statement of the Problem

This study determined the Food Hygiene and Safety Practices of Food Establishments as perceived by service crews and customers. Specifically, it answered and identified the food hygiene practices of the respondents in terms of personal hygiene, food preparation, safe food storage, and utensils and equipment. Additionally, food safety practices along food handling, physical condition, food management system, and health standards implementation were also determined. The difference between the perception of the two groups of respondents was established. Also, it enumerated the problems encountered by food establishments regarding the implementation of food hygiene and food safety practices; and as a result, proposed food hygiene and safety moderation plan was developed to improve the food hygiene and safety practices of these food establishments.

Methodology:-

To determine the food hygiene and safety practices along the identified variables as perceived by the respondents of this study who are service crews and customers of food establishments, a survey type of research was conducted. It utilized a survey-questionnaire with three parts that was subjected to reliability test using a Cronbach's alpha. A survey-questionnaire and unstructured interview were used as instruments to collect the actual data from the respondents that were selected through purposive and convenience random sampling. Prior to actual data gathering to a total of 100 respondents from 20 registered food establishments, a dry run was accomplished on 20 respondents on 4 random food establishments to ensure the validity of the instrument. The results of the data gathered were tabulated, analyzed and interpreted using appropriate statistical tools such as weighted mean, T-test for independent sample, frequency count, and rank.

Result And Discussion:-

Findings

Based on the analysis and interpretation of the data, the following findings revealed that the service crews strongly agreed on all the identified variables. They strongly agreed that employees of food establishments have good personal hygiene with a weighted mean of 4.76 and observe suitable food preparation practices with 4.81 weighted mean. In terms of safe food storage, it had a result of 4.75 and lastly, result also showed a weighted mean of 4.67 along utensils and equipment which suggests that this group strongly agreed that food establishments have safe food storage and use appropriate utensils and equipment. In relation, the customers also agreed that all the variables under Food Hygiene are being employed. Results of weighted mean on specific variables such as Personal hygiene practices showed a result of 4.29 and along food preparation with 4.31 which reflected that the respondents agreed that employees follow both personal and food preparation practices. Moreover, it was also agreed on that food

establishments have safe food storage and uses proper utensils and equipment with a weighted mean of 4.36 and 4.31, respectively.

Similarly, the service crews strongly agreed that food establishments follow food safety practices of in terms of proper food handling with a weighted mean of 4.67 and has good physical condition of facilities with a result of 4.65. The result also showed that it adheres to strict food safety management system with a weighted mean of 4.68. Additionally, enforcement of Covid-19 minimum health protocols was also strongly agreed by the respondents as result disclosed a weighted mean of 4.60. The assessment of the customers in general, agreed that food establishments adhere to food safety practices along food handling with a 4.25 weighted mean. Provision of suitable physical condition of facilities presented a result of 4.43 and adherence to applicable food safety management system with 4.27 which means that it was agreed upon by this group. Lastly, along health standards implementation, results displayed that they agree that food establishments obey strict Covid 19 health standard protocols with a 4.19 weighted mean.

Relative to personal hygiene, the t computed value of 3.69 is greater than the t critical value of 1.98 with degrees of freedom of 98 at 0.05 level of significance. Therefore, there is a significant difference between the assessment of service crews and customers on food hygiene of food establishments. Similarly, there is a significant difference between the assessment along food preparation of service crews and customers as the t computed value of 2.70 exceeds the t critical value of 1.98 at 0.05 level of significance with degrees of freedom of 98. Hence, the rejection of the null hypothesis. In addition, there is a significant difference between the assessment of the service crews and customers as result showed that the t computed values of 4.28 and 4.83 are greater than the t critical value of 1.98 with degrees of freedom of 98 at 0.05 level of significance in terms of safe food storage and use of proper utensils and equipment, respectively.

There is also a significant difference between the assessment of the two groups of respondents in terms of food handling, food management system, and health standards implementation as the t computed values of 3.04, 2.56, and 2.44 are greater than the t critical value of 1.98 at 0.05 level of significance with degrees of freedom of 98, respectively. Nonetheless, the t computed value of 0.70 is less than the t critical value of 1.98 with degrees of freedom of 98 at 0.05 level of significance which means that there is no significant difference between the assessment of both respondents on the physical condition of the establishments.

The service crews and customers identified the three most critical problems encountered by food establishments along food hygiene. These are as follows; 1) Insufficient supplies used in food preparation, 2) Inadequate utensils and equipment and limited water supply and toilet facilities, and 3) Unavailability of protective personal equipment (PPE) among food handlers.

With regards to food safety practices, there were also three similar critical problems encountered by both respondents. The following problems are as follows; 1) Insufficient floor space, lighting and ventilation, 2) Poor working relationship with co-workers and 3) Time pressure caused by poor staffing and volume of customers.

Based on the results, a proposed food hygiene and safety moderation plan was developed to improve the food hygiene and safety practices of these food establishments.

Conclusions:-

The following conclusions were drawn based on the findings of the study. As perceived by service crews and customers, food establishments display appropriate food hygiene practices along personal hygiene, food preparation, safe food storage, and utensils and equipment. Similarly, suitable food safety practices were also perceived to be implemented in terms of food handling, physical condition, food safety management, and health standards implementation.

There is a significant difference between the perceptions of service crews and customers in terms of Food Hygiene along personal hygiene, food preparation, safe food storage, and utensils and equipment. However, in terms of Food safety practices, there is significant difference between the assessment of the two groups of respondents in terms of food handling, food management system, and Health Standards implementation but there is no significant difference along the perception of respondents regarding physical condition.

Three most critical problems in food establishments as assessed by both groups of respondents along food hygiene are 1) insufficient supplies used in food preparation, 2) inadequate utensils and equipment, and limited water supply and toilet facilities, and 3) unavailability of protective personal equipment (PPE) among food handlers. Correspondingly, with regards to food safety practices the following problems were discovered: 1) insufficient floor space, lighting and ventilation, 2) poor working relationship with co-workers and 3) time pressure caused by poor staffing and volume of customers.

Recommendations:-

The following recommendations were suggested based on the prior conclusions. Food Establishments may develop and employ an approach to furnish long-term accomplishment in delivering excellent customer satisfaction through Total Quality Management System (TQM). Food establishment Owners may work collaboratively with Related Government Agencies to enhance the Food safety practices by creating policy groundwork and clear-cut protocols on food safety. They may also adapt the standards of the TQM and make improvements by employing effective methods for a continuous and constructive communication with the customers through feedback mechanisms and other activities that involve customer's participation. Further, Food establishment management may develop operational management policies focused on areas such as personal and must address the need for food handlers to comply with the health standards by ensuring the provision of required work resources and trainings on food safety, customer relations and teamwork. The Food Hygiene and Safety Moderation Plan may be submitted to proper authorities for further review and evaluation prior to its implementation. And lastly, further research in line with the present study may be conducted in a wider scope to supplement the findings revealed in this study.

Bibliography:-

1. Azanza, M. V., Membrebe, B. Q., Sanchez, R. R., Estili, E. C., Dollete U. R., Feliciano, R. J., and Garcia, K. A. (2019) Foodborne Disease Outbreak in the Philippines (2005-2018) Department of Food Science and Nutrition, University of the Philippines. Retrieved from https://philjournalsci.dost.gov.ph/images/pdf/pjs_pdf/vol148no2/foodborne_disease_outbreaks_in_the_Philippines.pdf
2. Implementing Rules and Regulations of Republic Act No. 10611. Joint DA-DOH Administrative Order No. 2015-0007. Retrieved from <https://bit.ly/3g7Ytqd>
3. World Health Organization (2020). WHO Director-General's opening remarks at the media briefing on COVID-19. Retrieved from: <https://tinyurl.com/cbb2tm6d>
4. World Health Organization (2020). "Corona Virus Diseases (COVID-19) pandemic" Retrieved from: <https://tinyurl.com/5pz5hjfs>
5. World Health Organization and Food and Agriculture Organization of the United Nations (2020). COVID-19 And Food Safety: Guidance for Food Businesses. Retrieved from: <https://tinyurl.com/hc8jr6v4>.