



# "Flock Fortress: Bio-security Practices by Backyard Poultry Keepers"



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## INTRODUCTION:

✓ Backyard poultry biosecurity is crucial for protecting flock health, preserving the economy, ensuring safe food, and promoting the sustainability of poultry farming.

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## OBJECTIVES:

✓ The objective of this study was to explore the profile characteristics of poultry owners, examine the flock and management characteristics, and evaluate their level of awareness and understanding concerning biosecurity measures among backyard poultry keepers in the Gujarat region.

## **METHODOLOGY:**

- ✓ The cross-sectional study was carried out data collected during training program conducted in March 2023 at Anand, Gujarat, India, with the participation of 27 individual farmers.

## **QUESTIONNAIRES:**

- ✓ Data were gathered from all participants through pre- training and post-training questionnaires administered during the training.
- ✓ Both quantitative and qualitative variables in the study were subjected to percentage, frequency and descriptive statistical analysis, conducted using the Statistical Package for the Social Sciences (SPSS).
- ✓ To better understand relationships and similarities among variable categories, performed Factorial Analysis of Mixed Data (FAMD) using the FactoMineR & Factoextra package for creating informative graphical visualizations.
- ✓ The graphical representation of Likert-scaled responses was created using a Likert graph, made with Microsoft Excel©.



## **RESULTS:**

- ✓ The study involved the participation of 27 farmers, who underwent a one-day training session and responded to pre- and post-questionnaires during the surveys.
- ✓ The study revealed that the farmers were Mainly young, with an average age of 35 and 44.44% of farmers holding graduate degrees.

- ✓ Experience in Backyard Poultry : Average 3.48 years.
- ✓ The majority of participants had flock comprising 56.68% chicks, 5.61% males, and 37.69% females, were observed. Additionally, the study findings revealed that 74.07% of farmers incorporated diverse species, including goats, cattle, and buffalo.
- ✓ Only 7.4% of participants were aware of antimicrobial resistance (AMR).

- ✓ Among the participants, 59.25% followed the vaccination program.
- ✓ 48.1% farmers knows the constraints of backyard poultry farming diseases.
- ✓ The majority of farmers (82%) strongly agreed that biosecurity measures should be implemented whereas 16% concurred all listed biosecurity measures are not easy to be implemented.

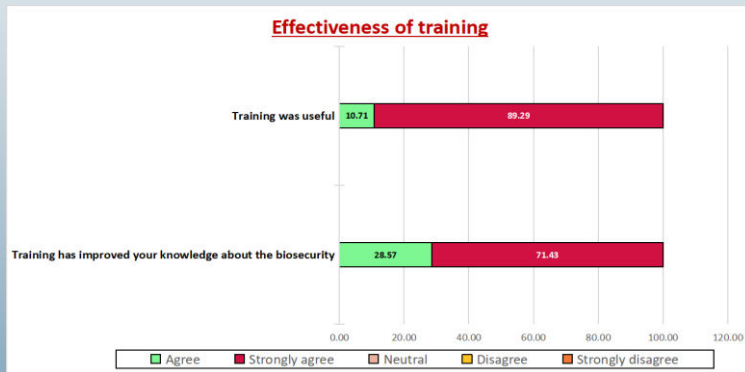


Figure 1

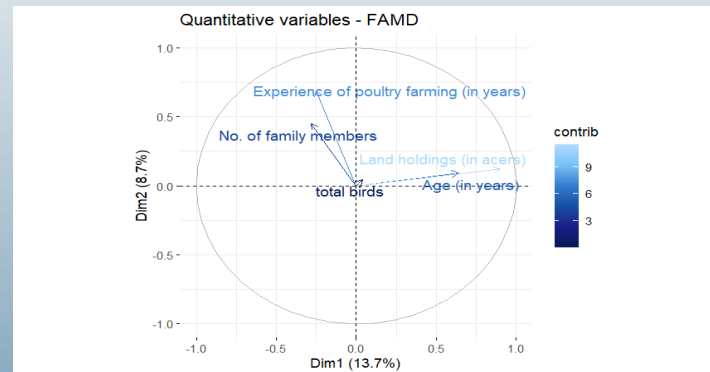


Figure 2

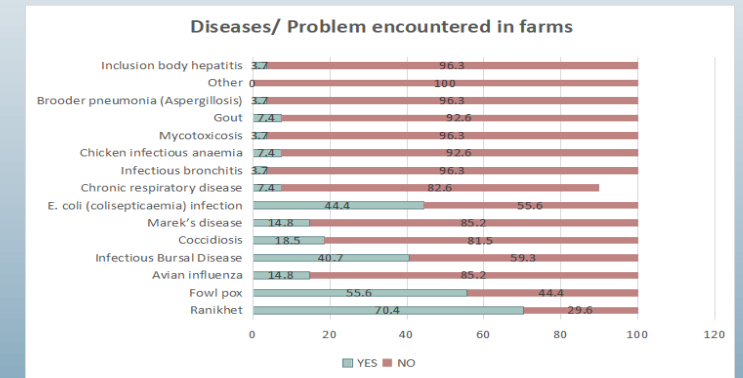


Figure 3

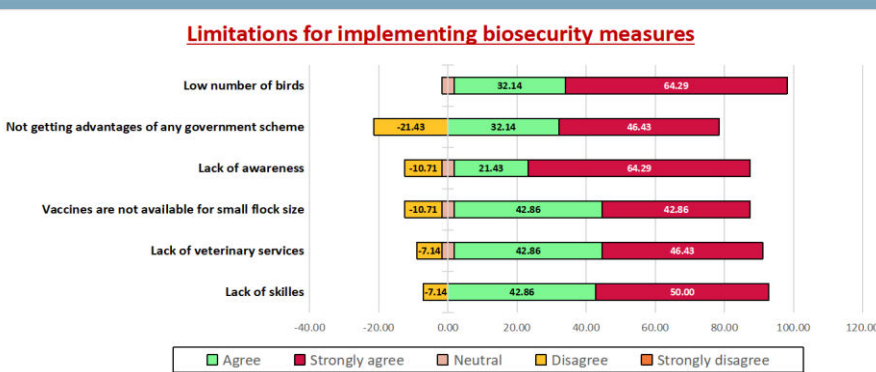


Figure 4

## CONCLUSION:

The backyard poultry farm training of farmers can bring some changes in their practices. This study effectively explored the farmer profile and flock characteristics of backyard poultry farms in the Gujarat region, providing insights into their understanding and awareness of biosecurity measures. This training was useful to improve the biosecurity practices.