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JIVA FIELD REPORT ON

LEAD FARMER TECHNICAL AND HANDHOLDING SUPPORT TRAINING ON BIO-CONCOCTION PREPARATION, BACKYARD POULTRY AND FISHERY THROUGH NF APPROACH

10th to 12th January, 2026

Dudhe Budhe Village,
Paschim Medinipur District, West Bengal

Project Faciliating Agency
Ramky Foundation (RF)

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OVERVIEW AND THE CONTEXT

The JIVA program, as outlined in the Detailed Project Report (DPR), includes provisions for training and support of Lead Farmers through various on field and hand holding for enhancement of technical Knowledge. WASSAN have been supporting to each JIVA PFAs location on various topics and themes according to the DPR. In line with this, the Resource Support Agency (RSA) team recently visited the implementation area of Ramky Foundation in Paschim Medinipur District of West Bengal, to conduct Lead Farmer training and providing on-ground support.

This training aimed to enhance the capacities of selected Lead Farmers and PFA's staff, prepare them to become Internal Farmer Resource Persons (IFRPs) under the guidance of master trainer and expert on specific theme from WASSAN. The objective is to strengthen grassroots-level systems and promote the effective implementation of agroecological practices within the project area and established the support service system to the farmers in the landscape.

OBJECTIVE OF THE TRAINING

The training was designed to help Lead Farmers and PFA CRPs transition into IFRPs through on-field demonstration and mentorship. It focused on bio-input/concoction preparation, demonstration of crop diversification models and Packages of Practice (PoPs), technical support and hand holding training on Backyard Poultry and NF Fishery and understanding the existing farming communities' practices.

- Analysis of Present practices & key challenges.
- Sharing experiences of farmers from different clusters (Past Learnings of last seasons).
- Inputs in Pond Management practices and culture species.
- Nutritional requirements of fish, feed type & preparation methods.

STATUS OF JIVA PILOT PHASE

The JIVA program is currently in its pilot phase in Paschim Medinipur District of West Bengal and is being implemented by the Ramky Foundation team. The Ramky Foundation team has initiated the project in a village and under 1 cluster. Lead farmers have been identified from the village. The settlement pattern of the village is divided into several *tolas*—clusters of households separated from each other, with large paddy fields situated between them. The first half-yearly budget was released and utilized accordingly. During this pilot phase, the PFA planned to work closely with the selected lead farmers.

Even though project is in middle the PFA team is working with the lead farmers closely for the enable them into natural farming.

MAJOR ACTIVITIES

The three days of the training focus on combining technical support to PFA CRP's and Lead Farmers with on-field demonstrations. These sessions focused on soil health, seed systems, and the preparation and application of bio-fertilizers, bio-pesticides, and growth promoters for natural pest and disease management.

Additionally, the RSA team demonstrated a variety of cropping models, including line sowing, intercropping, multi-layer, and mixed cropping in vegetables as part of a 365-day cropping pattern. The RSA team also includes the importance of PMDS (Pre-Monsoon Dry Sowing) and Rabi Dry Sowing techniques aimed at improving soil health using only green manure or natural soil cover—without any external inputs.

The **second day** - Poultry expert took session on BYP and Breed farm and HH level farming and shelter development and its management. And the Last day (day-3) -

Session took on Fish rearing and its production system in Natural Farming Approach by WASSAN Experts.

The training was facilitated by the RSA team, including Mr. Shaik Khadervali (Master Trainer), Mr. Kalyanapu Uday Kumar (Expert – Poultry) and Mrs. Priyanka Patra (Expert – Fishery) - WASSAN and organized by the Ramky Foundation team, represented by Mr. Nanigopal Maiti and his team.

DAY 1 | 10th January

TECHNICAL KNOWLEDGE ON BIO-INOUT, AND SOIL SYSTEM IN NATURAL FARMING

Following the welcome address, Mr. Nanigopal Maiti inaugurated the training by sharing the objectives and rationale of the Bio-Concoctions Training under the JIVA Natural Farming Initiative. He explained that the training aimed to promote eco-friendly and cost-effective farming practices that reduce dependency on chemical inputs while reviving traditional and sustainable methods.

The first day of the training program was dedicated to an in-depth understanding of soil health, with a focus on the use of bio-fertilizers such as *Jeevamrit*, *Ghanajeevamrit*, as well as green manure practices like *PMDS* (Pre-Monsoon Dry Sowing) and covering the soil through *'365 days'* cropping pattern. The session emphasized the technical aspects of soil health and its importance in sustainable and climate resilient agriculture practices. The facilitators provided a detailed explanation of the importance, usage, and impact of these natural inputs in improving soil and plant health. The primary aim of the session was to provide practical exposure to local farmers on the preparation and application of inputs used in natural farming.

Further the trainer provided theoretical and pravhctical session on seed treatment, pest management, plant nutrition enhancement and demonstration of various multi, mix, and inter-cropping models. Under the guidance of Sheikh Khader Ali and Monuhar Pegu, the sessions introduced farmers to a range of natural formulations used in regenerative agriculture. The resource persons explained both the theoretical aspects and the science behind each formulation, including their microbial activity, plant protection properties, and role in maintaining soil health. The following bio-inputs were covered during the morning theory session:

1. **Beejamrit:** A natural seed treatment formulation that protects seeds from fungal and bacterial infections while enhancing germination.
2. **Dashparni Ark:** A broad-spectrum herbal pesticide made from ten locally available leaves, effective in pest control.
3. **Agniastra, Brahmastra, and Neem Astra:** Bio-pesticides formulated with cow urine, chili, garlic, and neem leaves to control insect infestations.
4. **Gobar-Gomutra-Hing Dravan:** A natural growth promoter that enhances crop vigor and fruit quality.
5. **Panchagavya:** A fermented concoction made from five cow-based products that stimulates plant growth and boost immunity.
6. **Fish Amino Acid (FAA) and Egg Amino Acid (EAA):** Nutrient-rich bio-stimulants that improve vegetative growth and flowering.
7. **Bio Potash:** An organic potassium source that strengthens plant cells and improves yield quality.

After the theory sessions, farmers participated in hands-on demonstrations, where they learned to prepare each formulation step-by-step using locally available materials. Mr. Khader has also demonstrated the preparation of Beejamrit, explaining its proportions, fermentation process, and practical application methods. The farmers worked in small groups, mixing the ingredients themselves, thus gaining confidence and ownership over the learning process.

Throughout the demonstrations, the trainers emphasized cost-effectiveness and local adaptability—highlighting how these bio-inputs could replace costly market fertilizers and pesticides without compromising productivity. They also discussed the environmental and health benefits of avoiding chemical inputs, underlining how natural farming aligns with the long-term sustainability of both land and livelihoods.

DAY 2 | 11st January

BACKYARD POULTRY AND CROPPING MODELS TECHNICAL KNOWLEDGE AND HANDHOLDING SUPPORT

The day began with a field demonstration of three major cropping models designed to promote crop diversification, intensification, and the establishment of nutrition gardens for farm households at Dudhe Budhe Village. Crops Including Maize, okra, mustard greens, carrot, beetroot, white and red radish, Sponge gourd, coriander, long beans etc. preferable RSA team suggested to cultivated local crops varieties but that should be under four core verities – cereals, pulses, oilseed, vegetables.

Following this, the entire group proceeded to Farmer Mallika sing's field, where a comprehensive field demonstration was conducted. The farmers were guided step-by-step on:

1. Field preparation techniques suitable for different crops.
2. Determining the height and width of ridges for better drainage and root development.
3. The benefits of ridge planting, including improved soil aeration and water conservation.
4. Ideal spacing between ridges for optimum crop yield.
5. Intercropping methods for planting a variety of vegetables within the same ridge.
6. The use of dried leaves and crop residues for mulching, improving soil structure, and conserving moisture.

After the introductions, Mr. Uday (WASSAN) led the training session on Desi Poultry capacity building. To set the context, he initiated an interactive discussion with participants by asking them about:

- The types of livestock they rear in their villages
- Reasons for choosing specific livestock
- Purposes of rearing (income, nutrition, risk mitigation, etc.)
- Benefits and challenges experienced

Through this discussion, the major livestock systems practiced in the villages were identified and categorized as:

- Large ruminants
- Small ruminants
- Desi poultry
- Piggery (swine)
- Ducks

For this training, 90 % HH Having Desi Poultry, the focus was placed on Desi poultry, as it emerged as a major livelihood activity among tribal households. Participants discussed local Desi poultry breeds, reasons for rearing them, challenges faced, and possible solutions through a brainstorming process.

Key Topics Covered

The training included detailed discussions on the following topics:

- Importance of Indigenous (Desi) Poultry and its livelihood and nutritional benefits.
- Poultry production systems in tribal and rural areas and their relevance.
- Importance of shed hygiene and sanitation.
- Nutritional requirements of Desi poultry and Feeding schedules and practices.
- Common Diseases, Deworming and Prevention measure.

Group Activities

Participants were divided into three groups to work on practical problem-solving exercises:

1. Identification of healthy and unhealthy birds based on symptoms
2. Local disease mapping, including:
    - Month of occurrence
    - Local disease name
    - Symptoms
    - Local treatment practices
    - Mortality percentage
3. Poultry economics, analyzing:
    - One hen and one cock over one year
    - Egg production, chicks hatched
    - Birds sold and consumed
    - Input costs and net income

Each group presented their findings, followed by collective discussion. Mr. Uday facilitated the session by adding missing technical aspects, clarifying gaps, and highlighting key learning points from each activity.

Local Feed Ingredients Identified

Participants collectively listed locally available feed resources and developed a low-cost feed formulation:

- **Energy sources (50%-70%):** Maize, rice, broken rice, millets and may add Household waste (20%): Kitchen waste, leftovers, Husk etc.

- **Protein sources (20% 30 %):** Groundnut cake, sesame cake etc.
- **Mineral mixture and salt (5%)**
- **Calcium sources (5%):** Fish bones, eggshells, snail shells

Detailed Discussion on Poultry Diseases Through the PPT and Video

A detailed session on poultry diseases was conducted through a structured PPT presentation, followed by participatory group discussions. The session covered classification of diseases into contagious, non-contagious, and protozoal diseases, helping farmers clearly understand modes of transmission, risk factors, and preventive measures.

Farmers actively participated in group discussions and presentations, where they shared field-level experiences of disease occurrence in their villages. Based on collective analysis, the groups ranked the top poultry diseases affecting Desi birds in the area as follows:

1. Newcastle Disease (Ranikhet Disease)
2. Fowl Pox
3. Diarrhoea-related conditions

In addition, Bird Flu was discussed to create awareness on symptoms, reporting mechanisms, and biosecurity measures, emphasizing early reporting and prevention rather than treatment.

A special focus was given to local herbal treatments and ethno-veterinary practices. Farmers shared traditional knowledge on the use of locally available medicinal plants, and methods for preparing and administering ethno-veterinary medicines were explained and discussed in detail.

Use of Posters and Visual Learning Tools

The following key topics were explained using posters and PPT visuals to enhance understanding:

1. Chick management practices
2. Ethno-veterinary practices
3. Cleaning and hygiene of poultry sheds
4. Best Practices of Package of Practices (PoP) for Desi poultry

Each poster was explained in detail with practical examples relevant to village conditions.

Practical Demonstrations

Hands-on practical demonstrations were conducted as part of the training, including:

- Identification of hatchable eggs, covering size, shape, shell quality, cleanliness, and crack detection
- Live demonstration using eggs to differentiate hatchable and non-hatchable eggs

DAY 3 | 12th January

TECHNICAL HANDHOLDING AND SKILL SUPPORT TO FISH FARMERS

The day-3 skill training for Fish Farmers was organized at Dudhebudhe village, Paschim Medinipur district on 12th January 2026. Farmers were oriented on fish culture, management & practices. Focus was given to understand present practices and train farmers for location specific fish farming. Around 30 fish with various levels of experiences participated in the training.

The training served as a cross-learning platform among the farmers with inputs from experts.

Group Activity

The program started with the discussion of fish farmers experiences and challenges during fish farming. Group activity was held where the fish farmers from each clusters shared their pond types, fish species, stocking details, present culture practices and yields from fisheries. Farmers were divided into three groups based on farming experiences.

Outcome

The group discussion provides insights to their pond status, fish production, total income and expenses. The data reflects the potential of fisheries as a livelihood improvement source for the households. The pond size varies from 12-30 decimals. Farmers get a harvest of 20-30 kg fish in average from a small pond.

Farmers were not aware of the suitable fish species selections, pond management and feed requirements. They also face certain issues of tree leaves decomposition, eutrophication, more investments and less harvest. You need big perennial ponds for fish culture - which is a myth, rather small and seasonal farm ponds, when managed with good practices, hold significant potential for achieving good productivity.

The activity followed by the inputs given through presentation by Ms Priyanka, Fisheries expert, WASSAN. She focused on pre-stocking, stocking and post-stocking managements for ponds, importance of species selection, fish nutrition, fish diseases and treatments. The growth of fish and total fish yield is comparatively better where fish farmers regularly give feed & apply locally available manure, *Dravajeevamrutha*. She also explained on "Eco-farm pond" model where Pond bunds with plantation will give a better income showcasing the efficiency of integrated farming system rather than Soley depending on fish culture. Fish-cum-poultry, fish with duck or livestock can be better household models where manure and waste can be used in fishponds for better growth and also serves as multiple income sources for a rural household.

Aakash Kumar Sharma, DDM, Paschim Medinipur, NABARD explained the objectives of JIVA program and its significance for sustainable livelihoods. He mentioned that adopting natural farming practices, field learnings improve food security and income.

A practical demonstration on fish feed preparation and feeding schedules, where farmers learnt method to prepare the feed using local ingredients and application of feed with minimum wastage.


Ghanajeevamrit
घन जीवामृत

This focused on preparing low-cost fish feed using locally available ingredients so that farmers can reduce input costs while maintaining fish growth.

Fish record keeping card is shown which is necessary to maintain and follow to ensure systematic farm management.

ACTION PLAN AND WAY FORWARD

The following action points were finalized:

- **BIO-INPUTS AND NF PRACTICES:**
  1. Establish BRC at Dudhe Budhe village
  2. Establish minimum 10 diversity cropping models plots at the entire landscape for FFS development
  3. Closely working with EFRP deployed by the RySS for enable the farmers into NF and established FFS at the Landscape
  4. Continuous follow-up
- **POULTRY:**
  1. Vaccination plan covering Lasota, R2B, and de-worming, identification of local vaccinators
  2. Selection of interested breed farmers and establishment of one Desi poultry breed farm entrepreneur
  3. Regular household-level training on ethno-veterinary practices

- **Fishery:**
  1. Identifying suitable fishponds for bund intensification & planting horticulture trees/vegetable in bunds.
  2. Follow up pond management practices
  3. Maintain fish card record

CONCLUSION

The pilot phase of the JIVA program at Dudhe Budhe village in Paschim medinipur District, West Bengal, presents promising opportunities but also highlights the need for strategic interventions in key areas. The region's agro-ecological diversity, relatively larger landholdings, motivated farmer base, and abundance of natural resources provide a strong foundation for the successful implementation of Natural Farming practices.

The PFA demonstrates capable leadership and entrepreneurial drive, while the NABARD Officials are energetic and supportive. There is also potential for meaningful convergence with various government departments and allied institutions. It is also necessary to involve KVK and, several departments—such as the Department of Agriculture, and Horticulture in the JIVA program.

It is crucial to strengthen community institutions so that this initiative is not seen merely as a project, but as a collective responsibility and an opportunity for long-term change. With the guidance of the PFA and NABARD's DDM, and through ongoing capacity-building efforts, farmers can be empowered to lead the transition towards an ecologically sound, economically viable, and socially just farming system.

The readiness and engagement shown by the community reaffirm that with the right support structures in place, JIVA has the potential to become a transformative model for regenerative agriculture and sustainable rural livelihoods in the region. The RSA team remains committed to supporting this journey fully.