As a part of the Transforming Agrifood Systems in South Asia (TAFSSA) initiative's holistic food systems approach, IWMI led a study tracing the historical evolution of food systems in the state of Odisha, India. The expert consultation aimed to solicit views on framing and situating the historical study within the current food systems-related discussions. The study is conducted by Dr. Anindita Sarkar, Delhi University. Stakeholders offered substantial feedback on increasing the geographical and community scope of the study, important timelines to include, and relevant issues of the local agrifood system relevant for the region.

OVERVIEW
As a part of the Transforming Agrifood Systems in South Asia (TAFSSA) initiative, IWMI commissioned a study to trace the evolution of food systems. The diverse political influences and agrarian histories in South Asia have played a significant role in determining the region's heterogeneous regional contexts of agricultural development. The roots of many current agrarian and environmental issues and policies lie in historical processes and developments. Learning from these historical policies and development pathways thus offers a critical perspective to inform and contribute to future agrifood systems transformation and policy.

In this context the state of Odisha has been taken up as a case to analyze the historical trajectory of agrarian policies. Odisha is a state of India which is situated in the eastern coast along Bay of Bengal. More than 83 per cent of its total population lives in rural areas and depends primarily on agriculture for livelihood. Despite having a strong natural resource base it is reported as one of the backward states in India. The incidence of poverty is a major concern of the state. Overall, the history and geography of the region plays a vital role in agrifood systems which is intrinsically linked to the overall livelihood dynamics of the state.
KEY OBJECTIVES

- Tracing the historical trajectory of agricultural policies to inform and frame policy experiments towards equitable solutions aligning production systems with local ecological resource endowments
- Assessing gaps and developing policy relevance for historical evolution analysis through region-specific expert multi-stakeholder consultations

PARTICIPANTS AND MODALITY

The workshop was designed for a small group of expert participants representing different stakeholder groups, including – government policymakers, policy implementers, international and grassroots civil society, research and academics, and user groups. The workshop was designed in a hybrid mode to enable broader participation. The workshop was attended by about 25 participants, including both in-person and online modes.

DISCUSSION

Dr. Alok Sikka, International Water Management Institute (IWMI) country representative - India, welcomed all the participants and explained the role of CGIAR-IWMI through the various thematic works undertaken by IWMI India.

Presenting the objective of the study and project: Dr. Aditi Mukherji

Dr. Aditi Mukherjee, Director of Climate Change Impact Area Platform at CGIAR and co-lead for TAFSSA work package 5, introduced the TAFSSA project and vision of policy contribution through historical evolution research. Dr. Mukherjee described TAFSSA as a gateway to the rest of CGIAR’s global research efforts. She explained the initiative aims to support actions that improve equitable access to sustainable healthy diets, improve farmers’ livelihoods and resilience, and conserve land, air, and water resources in South Asia. In addition, the initiative focuses on strengthening impact through engagement with public and private partners across the production-to-consumption continuum to achieve productive, environmentally-sound South Asian agrifood systems. With this aim, the project aimed to study the historical trajectory of agricultural policies to understand the reasons for the current agrarian challenges.

Presentation by the research team on the Odisha study: Dr. Anindita Sarkar

Dr. Anindita Sarkar, Consultant (IWMI), presented the study on tracing the historical trajectory of agricultural policies to inform and frame policy experiments towards equitable solutions aligning production systems with local ecological resource endowments. Dr. Sarkar explained the agrarian transformation from pre- to post-independence through a policy lens emphasizing the historical reasons for the current agricultural challenges and opportunities, such as land distribution, climate risks, low investments in irrigation, liberalization, and its impact. The study aimed to answer the following questions

1. What are the significant political, economic, and social developments in Odisha that have taken place from 1850 to recent times that have determined agrarian relations and outcomes for the state?
2. What are the major climatic events in historical and current times (e.g. droughts and floods) that have influenced the evolution of food systems?
3. What are the temporal continuities and discontinuities in agrarian relations and outcomes between 1850 and current contexts?
Stakeholder discussions, feedback and takeaways
Stakeholder critical engagement was facilitated and structured around three key questions, and the attendees were divided into groups to discuss these questions and provide feedback:

1. List some of the critical events and turning points in the past that are influencing current outcomes on agrifood systems in Odisha
2. What source of information (e.g. Archival databases) can we use to document and study these periods and historical turning points?
3. Are there any current initiatives and policy priorities in the agrifood sector that you feel we should study from this historical lens?

Experts were asked to delve into the above-listed questions to map out the lacunas of the initial review and provide a pathway for the future course of action in the context of various developmental processes in Odisha. The brainstorming session yielded several points as a way forward (for the three questions). Several ideas were presented in the context of Odisha’s agrifood system

Important events and turning points in the past that are influencing current outcomes of agrifood systems

1) **Mapping and restoring traditional waterbodies & resource distribution systems** - traditional water harvesting systems like tenda, paliya, chua, etc., need to be studied and incorporated into current policy frameworks such as schemes like MGNREG. Owing to dependence on rainfed systems, water capturing and harvesting of structures need to be strengthened. Watershed structures and planning need to be supported, which has slowed down post-PMKSY (Pradhan Mantri Krishi Sinchayee Yojana). Thus, it was suggested to study the policy implication with respect to these traditional structures.

2) **Critical analysis of Odisha millets mission** – the millets mission has been attributed as one of the major policy moves in recent years. Moreover, 2023 is already being celebrated as the year of millets, here the learnings of Odisha can be showcased to understand the historical practices and the best possible method of implementation.

3) **Food cultures** - Mapping agricultural and dietary practices in the tribal-dominated areas would provide a valuable reference to the indigenous methods because these pockets remained relatively unaffected by British agrarian interventions.

4) **Food Loss** - Food loss is a major challenge, and it was suggested to cover aspects of food loss and wastage levels, during the historical coverage of various policies.

5) **Conservation of germplasm** - It was recommended to incorporate the aspect of conservation and ownership of germplasm, particularly concerning the Biodiversity act of 2002 (conservation and access to benefits).

6) **Land Rights** - It was recommended to examine the impact of Statutes such as Panchayat (Extension to Scheduled Areas) Act (1996) & Forest Rights Act (2006), which gave the tribal farmers rights (Traditionally community and Individual rights). There are areas where the rights of the forest community have been regularized, especially individual rights. It secured land ownership, thereby securing food systems in the tribal communities in these belts. However, these developments are murkier as well and there is constant conflict with the Forest Department.
Crucial Resource/Stakeholders/Organization for future reference
1. Government departments- Irrigation Department, State Archives(Ethno-graphic records), Mission shakti
2. Traditional Livelihoods/Dietary Practices- Civil societies like NIRMAN; Vasundhara; RCDC, SHRUSTI, PRADAN
3. Traditional water harvesting systems- Civil societies like PRADAN, RCDC, Richard Mohapatra(CSE), UNDP

Current initiatives/policy priorities in the agrifood sector-way forward
Policy-technology linkage
Policy & technology linkage was considered an important aspect in the context of Odisha. It was proposed to promote Integrated farming systems and millet-based multi-cropping systems. This would allow the small and marginal farm holders to not only create a buffer against shocks and stress situations but also contribute to stabilizing the agricultural income. Along with this conservation of indigenous crops on a cluster basis was also suggested. It was also proposed to examine existing policies such as the PDS system and investigate the impacts with respect to the current subsidized rice schemes for the community, will this be useful in the long run, Or will it paralyze our productivity systems?
Recommendations were also made regards to Mid-day meal schemes, focusing on quality by introducing the indigenous fish component. Decentralized planning-based extension systems were also given as a pathway for future development.

Storage and market access for food
Food loss is an important component of SDG 12. In the case of Odisha, the maximum food loss occurs during the production phase e.g., the milling process of paddy. Therefore, it was suggested to examine and incorporate this aspect. In order to address this storage particularly in-situ cold (solar-based) was discussed as an option.
The experts also discussed the requirement for the promotion and marketing of Organic and natural farming which should essentially incorporate traditional food products.
CONCLUSION

The expert consultation offered many significant inputs for strengthening the historical evolution analysis of the agrifood System in Odisha, making it more relevant to Odisha's context and policy processes. This included significant historical timelines, key policy events, and several region-specific sectoral processes.

PARTICIPATING STAKEHOLDER INSTITUTIONS

Some of the key institutions represented at the workshop were:

- Department of Agriculture and Farmers Empowerment
- XIM University
- United Nations Development Program
- Foundation for Ecological Security
- PRADAN
- Indian Institute of Youth and Development (IIYD)
- NIRMAN, Odisha
- ICAR-CPFA
- Harsha Trust
- ICAR-IIWM
- SHRISTI
- Overseas project and services Ltd
- Council for Social Development
- SaCiWATERs
- Regional Center for Development Cooperation

Gender & agriculture

Given the female labor participation, the gender dimension of agrifood systems becomes a crucial aspect. In this context, an interesting suggestion was provided regarding farm equipment ergonomics. Studies are required for the development of gender-inclusive farm equipment & technology.

Traditional practices & Food cultures

The stakeholder engagement suggested bringing in studies to document traditional methods which are part of agrifood systems. This would include the following:

1. Capturing the traditional water bodies (e.g. in western Odisha,)
2. Dry-food systems(Preservation), which were a mechanism for survival during the lean period,
3. Revisiting traditional millet-based mixed farming was very rich from a dietary point of view
4. Studying the tribal systems- These systems were not only areas of biological diversity but also cultural importance. Tribal culture and indigenous knowledge systems have important aspects of conservation. A lot of the tribal festivals are directly connected to agro-food systems therefore such festivals and knowledge systems should be preserved to secure the tribal agro-food systems of Odisha.

To cover these aspects, the stakeholder group suggested looking into the anthropological and ethnographic methodology to document and understand the food system of Odisha through cultures, caste relations, religious customs, etc. Several Initiatives that have been undertaken by various government departments to promote indigenous varieties were also discussed, for instance, the state agriculture department has documented various indigenous varieties and has been promoting traditional varieties such as Kala Champa.

Another important aspect discussed and suggested was, studies on uncultivated foods(e.g., Non-timber forest products) are another lost opportunity, especially in the tribal belt. And food as medicine should be promoted through herbal and kitchen gardens.
ABOUT TAFSSA
TAFSSA is a CGIAR regional integrated initiative to support actions that improve equitable access to sustainable healthy diets, improve farmers’ livelihoods and resilience, and conserve land, air, and water resources in South Asia. For more details about the initiative see https://www.cgiar.org/initiative/20-transforming-agrifood-systems-in-south-asia-tafssa/

ABOUT CGIAR
CGIAR is a global research partnership for a food secure future. Visit https://www.cgiar.org/research/cgiar-portfolio to learn more about the initiatives in the CGIAR research portfolio

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SUGGESTED CITATION

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