

**“Back to Nature, Subhash Palekar Natural Farming, Natural Terrace Gardening”**  
**Interactive Session with Padma Shri Subhash Palekar**  
Online lecture held on 20 October 2020, 5.30 PM

*In this interactive session on Back to Nature, Subhash Palekar Natural Farming, Natural Terrace Gardening”, organized by Vidyalkar Dnyanapeeth Trust, Indian agriculturist, Pioneer of SPNF (Earlier known as ZBNF–Zero Budget Natural Farming), Krushi Rishi, Padma Shri Subhash Palekar Ji shared his journey of findings a simplified, self-sufficient, scientific and reliable method supported by a spirituality which protects environment and nature. He also convinced the benefits of natural farming concerning economy, food digestion, good health, and superior quality poison-free higher produce. He also explained the threat of possible diseases that are caused by consuming food produced by chemical/organic farming, poor eating habits, and an unbalanced diet. The nutritious diet, free from chemicals, fertilizers, pesticides that can be produced by individuals’ efforts with the help of Subhash Palekar Natural Farming. This method is based on traditional farming practices. It has attained massive success in southern India. In this farming method, the cost of growing and harvesting plants is negligible; farmers need not purchase fertilizers and pesticides from the market to ensure the healthy growth of crops.*

**About Padma Shri Subhash Palekar**

Shri Subhash Palekar is an Indian agriculturist actively involved in farming for the past 47 years, with 12 years of numerous experiments in natural farming, discovered ZBNF, a sustainable, ecological reliable farming method, which is now accepted by 15 states in India including Maharashtra, Karnataka, Telangana, Andhra Pradesh, Tamil Nadu, Kerala, Punjab, Haryana, Uttar Pradesh, Madhya Pradesh, Chhattisgarh, Jharkhand, Rajasthan, Gujrat, and West Bengal by more than 50 lakh farmers. Many state governments are keen on using ZBNF techniques. He has devoted himself to ZBNF and conducted hundreds of 10 days of free workshops/ lectures for farmers across the nation. Andhra Pradesh state government had appointed him as a ZBNF advisor to encourage natural farming. He has authored 27 books on ZBNF; these books are available in Marathi, Hindi, English, Kannada, Telugu, and Tamil. He received the fourth highest civilian award Padma Shri in 2016 from the Government of India for his notable contribution to farming.

**SPNF / ZBNF**

The roots of zero budget natural farming lie in the deep agrarian crisis that is making small scale farming an unviable vocation. Privatized seeds, inputs, and markets are inaccessible and expensive for peasants. Indian farmers increasingly find themselves in a vicious cycle of debt, because of the high production costs, high-interest rates for credit, the volatile market prices of crops, and private seeds. Many farmers have committed suicide in India in the past few years. ZBNF promises to end a reliance on loans, drastically cut production costs, and ending the debt cycle for farmers. The word ‘budget’ refers to credit and expenses, thus the phrase ‘Zero Budget’ means without using any credit, and without spending any money on purchased inputs. ‘Natural farming’ means farming with Nature and without chemical fertilizers, pesticides, and weedicides. The Four Pillars of ZBNF are:

1. Jeevamrut: ZBNF promotes the application of Jeevamrut - a mixture of fresh desi cow dung and desi cow urine, jaggery, pulse flour, water, and soil on farmland. This is a fermented microbial culture that adds nutrients to the soil and acts as a catalytic agent to promote the activity of microorganisms and earthworms in the soil.
2. Beejamrut: It is composed of similar ingredients as Jeevamruta - Desi cow dung, a powerful natural fungicide, cow urine, anti-bacterial liquid, lime, and soil. It is used for the treatment of seeds/ seedlings.

### 3. Acchadana - Mulching:

Soil Mulch: This protects topsoil during cultivation and does not destroy it by tilling. It promotes aeration and water retention in the soil. He suggests avoiding deep ploughing.

Straw Mulch: Straw material usually refers to the dried biomass waste of previous crops; it can be composed of the dead material of any living being. His approach to soil fertility is simple - provide dry organic material which will decompose and form humus through the activity of the soil biota which is activated by microbial cultures.

Live Mulch: It is essential to develop multiple cropping patterns of monocotyledons and dicotyledons grown in the same field, to supply all essential elements to the soil and crops.

4. Whapasa - Moisture: A plant root does not need a lot of water, thus countering the over-dependence on irrigation and electricity. Roots need water vapor, whapasa is the condition where there are both air molecules and water molecules present in the soil.

## **Back to Nature and Natural Terrace Gardening**

In ZBNF, nothing has to be purchased from the outside. Only 2% of nutrients are taken from the soil and the remaining 98% are taken from the air and solar energy for producing the food. Every green leaf produces food throughout the day. It takes carbon dioxide & nitrogen from the atmosphere. All required things for the growth of the plant are available around the root zone of the plants. These green leaves are food-producing factories. Stop purchasing and pouring chemical fertilizers, rather use natural fertilizers to make soil healthy. Hybrid/ genetically modified seeds are not needed for more food production. Weeding is not required; rather use an intercrop ecosystem to benefit from it. One Indian desi cow is sufficient (for cow urine and dung) for 30 acres of farming, producing the best quality food using this model. It can be used for any type of soil and environment, just with 10% water. All kinds of vegetables and fruits can be produced using ZBNF with kitchen waste, and Ghanjiwamrut in your terrace/ available space.

## **Takeaways**

In India, many of the UG/ PG and doctoral programs are theoretical, and less focus is on practical, applications and skills. Jobs may not be easily available or created in the future, however natural farming can produce multiple sustainable opportunities. He explained the importance of food habits required to be a healthy person based on acid-base physiology. He cited the examples of pH of foods produced by SPNF. The importance of enzymes as they enhance chemical reactions in breaking down food into pieces that can be absorbed by the body was highlighted. Dietary fiber is well known to prevent constipation, found primarily in fruits, vegetables, whole grains, and legumes with additional benefits, such as maintaining balanced weight and reducing the risk of diabetes, heart disease, and cancer. ZBNF also may help in lowering the population migration towards towns and cities for employment. The Finance Minister, recently in her budget speech highlighted the government's trust in ZBNF as one of the possible solutions for doubling farmer's income. A farmer can earn a minimum of 3 lakh rupees per acre, per annum by producing 42 types of poison-free multi-crops and principles of ZBNF. The United Nations, Food and Agriculture Organization, and UNESCO also have shown keen interest in ZBNF.

Prof Ambadas Deshmukh introduced the guest, interacted with him, and asked questions raised by participants, in conclusion, thanked Padma Shri Subhash Palekar Ji, organizers, and attendees.

Edited by - Dr. Gajanan Nagare, Prof. Vishwas Patil, Prof. Girish Gidaye, and Prof. Ambadas Deshmukh of Vidyalankar Institute of Technology