

College of Agriculture, Phaltan

Demonstration no.-2



Study of advanced irrigation system(Drip) By Host Farmer

DEMONSTRATION NO:1

STUDY ON ADVANCED IRRIGATION SYSTEMS (DRIP) BY THE HOST FARMER

NAME OF STUDENT:- Nale Sameer Bhanudas.

REG.NO.:- CAP-2017/86

DATE :-

TIME :

PLACE :- At the farm of Mr.bhanudas Nale.

No. of FARMERS PARTICIPATED:- 8

Material used :-

- 1) Drip irrigation system and its components
- 2) Water

Teaching aids :-

1. Manual of principle of Agronomy – I
2. Guidance of SMS

Introduction :-

- In RAWE Village Dudhebavi, There are large no. of farmers who cultivate the vegetables and fruit crops .
- So I was decided to conduct the demonstration on study of Advanced irrigation systems (Drip) by host farmer for the purpose of getting more knowledge about Advanced Irrigation systems for maximizing Yield, Profit and quality of produce to the farmers at this level.

Objectives:-

- 1) To aware the farmers about Drip irrigation.
- 2) To study the components of Drip irrigation.
- 3) TO increase crop yield.
- 4) To increase water use efficiency.

Planning: -

- 1) First I was discussed with concern SMS about the demonstration. He gave the all required information for the demonstration.

- 2) Then was meet to the farmers and decided date,time and place.
- 3) Then i was collected all required material i.e.chart,drip unit components.

Conduction :-

- 1) According to the planned programme I was organized
- 2) the demonstration in Dudhebavi village on the field of Mr.bhanudas nale.
- 3) First i was explained the reasons behind the Conduction of this demonstration.
- 4) Then i was gave the following information about Drip irrigation - It is the precise and slow application of watey through dripper near the root of the crop.Then I gave the information about drip components.

These components are -

- 1)**Filter** - a) Gravel (sand) filter
b) screen filter
c) Disc filter
- 2) Main line
- 3) Submain Line
- 4) Laterals

- 5) Emitters or drippers
- 6) Control Valves (Ball valves)
- 7) Flush valves
- 8) Air release cum vacuum breakage valves
- 9) Non-Return valves
- 10) Pressure Gauge
- 11) Grommet and take-off
- 12) End Caps
- 13) Fertilizer system

5) Later I told the Benefits of Drip irrigation to the farmers.

- Water saving to the tune 30-70%.
- Increased crop yield.
- Labour saving.
- Pure quality water is possible.
- No interference with cultural practices.
- It can be used hilly regions and Saline soils.
- Reduced weed growth due to partial wetting of soil.
- Saving fertilizer.
- Less disease and pest problems.
- Irrigation application rate adjusted as per the soil type.

Questions asked by farmers :-

1) In what amount water is saved by drip irrigation ?

Ans: Drip irrigation water is saved upto 30 to 70%.

2) How drip irrigation system save the water?

Ans: This System applies slowly near to root zone that save water use.

3) Is there any government subsidy for Drip irrigation?

Ans: Yes, there is subsidy upto 50%.

4) For which crop this system can be used?

Ans: Sugarcane, onion, chilli, Tomato, mango etc Almost all the crops.

5) Is there any limitation about drip irrigation?

= Initial cost is high.

6) Which filter is used for what purpose ?

Ans: 1) Gravel filter (sand)=Dirt and Algae

2) Screen filter =for Relatively clean water

3) Disc filter = Organic matter

7) what is the discharge rate of drippers ?

Ans:1 to 15 lit/hr.

Farmers feedback :-

- Farmers was to satisfied by my explanation and information about Advanced irrigation system Drip irrigation system.
- They become happy, as they use Drip irrigation system on their field.
 - They were satisfied with the answers given by me.

Student comments :-

- I was satisfied by the demonstration on advance Irrigation system i.e. Drip Irrigation system.
- I got the practical experience about drip irrigation.
- Many farmers promised me they apply drip irrigation system on their farm.

Follow up:-

After the conduction of the demonstration me and farmers were satisfied. They promised me to adapt new advanced Irrigation system on their farm.