

## Impact of AF's Programmes: A Case study

**K.Krishna Murthy, S/o Kapu Hanumantappa** is a young farmer from Nizavalli village of Kundurpi mandal in Anantapur District. He is 29 years old; he is living on his farm with his wife and 2 children. He has been doing agriculture since 9 years in his 16 acres of land with the support of his younger brother. He was forced to quit education after 10+2 (intermediate) as his family was not able to support him due to poverty. His father gave the existing rainfed land on lease but the lease amount was too low. So Krishnamurthy decided to do Agriculture to support his family.



In early years, Mr. Krishna Murthy used to raise Groundnut and Red gram in his rainfed land applying lot of chemical fertilizers and pesticides. Though he has taken all the care of his crops he was making loss each year. Because of inappropriate farming methods, the soil fertility was reduced and he ended up in huge debts.

Incidentally at that time, AF Ecology centre was implementing Watershed programme (supported by EED & ICCO) in Nizavalli village. The organization focused on improving productivity in rainfed lands by taking up Soil & Moisture Conservation works, Water Harvesting structures and Dry land Horticulture in the village. Mr. Krishna Murthy actively participated in the watershed activity and had availed all the benefits of the programme. He has taken up Horticulture in 12 acres of land with 650 mango plants in 2003. All the support required for survival of Horticulture plants like watering, gap filling, fencing etc were provided by AF Ecology centre. When the mango crop was in bearing stage, he sold the crop to a mango businessman for 2 years. To harvest bumper crop, the mango businessman used excess chemical fertilizers and pesticides which damaged the orchard. Then Mr.Krishna Murthy cancelled the contract and started nursing the plants himself by adopting sustainable Agriculture methods. He also planted 100 sapota plants as gap filling in the orchard plot.

The groundwater table in village had improved in the village because of water harvesting activities taken up by the project. Like many other farmers, Krishnamurthy also dug 2 bore wells and got enough water to irrigate his remaining land.



The field staff of AF centre has helped Mr. Krishnamurthy in adopting Sustainable Agriculture methods in his land and he practiced the methods with enthusiasm. He regularly followed the 'in house news letter' of AF Ecology center to update himself on Sustainable Agriculture methods. His conviction on organic farming has increased as he saw the difference in crops. He completely shifted to organic farming methods from 2009. He never purchased any chemical pesticide or fertilizer from 2009. Instead, he followed the technical advice given by AF Ecology centre extension staff and has been applying tank silt to the land every year to improve the moisture holding capacity and soil fertility. He regularly applies Farm Yard Manure and Jeevamritam to get good yields. To control pests he sprays herbal pest repellents which are prepared by using cow urine and different herbs. Also he uses neem cake, neem oil and sour buttermilk spray to control diseases. He controlled effectively the weeds like Thunga and Garika by incorporating paddy husk and GN shell husk into the soil. To save the moisture loss and suppress weed growth he followed mulching practices such as covering the soil with crop waste which improved the soil texture and fertility. He is also following innovative soil fertility methods like compartmental bunding, green manuring etc.

Mr. Krishna Murthy is following eco friendly diversified cropping systems to avoid crops loses and ensure sustainable incomes. He is growing Areca nut in beetal wine in 1.25 acre, Vegetables in 1.5 acres, Mulberry in 1.25 acre and paddy in 0.5 acre. He grows groundnut, jowar and maize as intercrop in orchards. Along with this he also has 50 coconut trees and 55 tamarind trees along the border of his land. His land is filled with lot of biomass tress like Neem, Pongamia and Subabul. He is also doing sericulture as income generating activity. So the farmer has continuous income round the year at regular intervals. He is providing wage employment to 10 people every day. His income from orchards and other crops are increasing steadily year after year. Most of his family needs are met from his own land. His family is not buying vegetables since many years. He has 5 buffalos and 1 cow and 2 bullocks which help in his farming. He also purchased a tractor. According to The farmer his incomes from each crop in the year 2012 are as follows:

<b>Sl.No</b>	<b>crops</b>	<b>Average Net income per annum</b>
1	Mango orchard	75000
2	Betel vine	20000
3	Areca nut	40000
4	Sericulture	180000
5	Tamarind	50000
6	Annual Rainfed crops	15000

7	Coconut trees	10000
	<b>TOTAL</b>	<b>3,90,000</b>

Mr. Krishna murthy said, "When I started farming, I was given 16 acre unfertile land and Rs 5 lakh debt. I have invested on my land to make fertile and productive, I repaid all my loans, dug bore wells, purchased tractor, constructed house and met family expenses. I have regular assured income every year. This has enabled me to overcome the droughts. All this was possible because of support from AF programmes. I suggest all the farmers to follow this system to beat the drought in Anantapur District."

Krishna Murthy made best use of AF's programmes and ideas and has transformed his low fertile land into a fertile one. He shifted from mono cropping to diversified and mixed cropping patterns. Through his hard work he has proved that agriculture is profitable. The important thing is that he is not the only one who has benefitted from the programme; there are thousands of other farmers who have benefitted and are able to live with assured income, self esteem and human dignity, in spite of frequent droughts. The farming system propagated by AF Ecology centre is helping the farmers to overcome the drought. This has been proved by farmers like Mr. Krishnamurthy.