

## Success Story -1

**Name of the KVK :-** Kandhamal

**Title:-** Off season vegetable cultivation

**Introduction:-**The district Kandhamal is favourable for off-season vegetable cultivation due its agro climatic condition .In this district the area covered under cauliflower is 3550 ha with a productivity of 109 q/ha .The district is predominantly inhabited by tribal peoples .The tribal farmers are resource poor & marginal farmers. They are cultivating cauliflower in traditional method. The low productivity of cauliflower is due to heavy pest, disease incidence & imbalanced use of plant nutrients. The soils of Kandhamal district is deficient in boron (81%). The production of crop is being increased by adopting the integrated pest & nutrient management practices.

**KVK Intervention:** - Cracking of Cauliflower due to Boron deficiency & pest incidence such as Diamond Back Moth & Spodoptera results in low productivity & marketability of cauliflower .Keeping in view the low productivity of cauliflower ,KVK has focused its efforts to maximize the productivity by providing training on integrated nutrient management practices & integrated disease & pest management in cauliflower. Also Training programmes were organized in the village level for imparting various technologies to the farmers about package & practices of Cauliflower cultivation .Demonstrations were conducted on INM and IPM in Cauliflower to increase productivity & marketability of cauliflower.

**Outcome:-** The KVK ,Kandhamal conducted demonstration on INM and IPM in Cauliflower in the field of Sri Sarat Sahu of village Bandaguda ,Block K-Nuagaon .Application of Neem cake @ 2.5 q/ha and lime @0.2 LR at the time of final ploughing with FYM @ 15ton/ha ,application of recommended dose of fertilizer application as per soil test results with Boron @ 2 kg /ha at the time of planting, spraying of Bt @ 2 gm/liter alternate with Cartap Hydrochloride @ 1.25 gm at 10 days interval gave an yield of 220 q/ha with an increase in productivity of 53 % over traditional practice. The bigger curd size and good quality of Cauliflower fetches good market value & Sri Sahu got an net profit of Rs.88690/- /ha with a B.C ratio 3.0.

**Impact:-** The out come of the demonstration has motivated the farmers to apply Boron, soil test based fertilizer application with pest & disease management to enhance the productivity of cauliflower. Inspiring the result of the demonstration most of the farmers of K-Nuagaon ,Raikia and Tikabali blocks are now giving much importance on IPM and INM practices for more yield & better marketability.



## Case Study -2

**Name of the KVK :-** Kandhamal

**Title:-** Seed production in Raikia Bean (Local)

**Introduction :-** Raikia bean is a local cultivar of Runner type of bean grown in Raikia ,G.Udayagiri & Tikabali blocks of Kandhamal district. The Raikia Bean is cultivated in 4200 ha in Kandhamal district with an average productivity of 30 q/ha. It is cultivated both in Kharif & Rabi season & used as a vegetable. The cultivar is native to Raikia block, it is runner type of bean. Due to fleshy, less fiber content & sweet to eat, it has wide market demand.

Sri Dauda Mallick , of village Bearpanga of G.Udayagiri block is a traditional cultivator of Raikia bean. Initially he cultivated one acre of Raikia bean with traditional practices. He got an yield of 10q from his one acre of land & selling it in the local market @ Rs.1500/q with a net profit of of Rs.8,000/-.He was not well aware about scientific method of cultivation which debarred him from adopting new technologies as well as rain fed farming situation al so contributed to lower yield.

**KVK Intervention :-**K.V.K, Kandhamal has trained the farmers on the benefit of seed treatment, line sowing with application of FYM. Front Line Demonstrations were conducted on Plant protection measures to control bacterial leaf blight & use of bio fertilizers, bio pesticides & INM.

**Output:-**By adopting the improved package and practices of Raikia bean cultivation with need based plant protection measures he got an yield of 16 q/acre under the technical guidance of KVK.The increase in yield was 60 % higher over his traditional practice with a net profit of Rs.15,000/- per acre.

**Outcome:-**Due to heavy demand of Raikia bean seeds among the farmers, KVK has advised him to go for seed production & provide him technical guidance. In the year 2009-10 he has cultivated Raikia Bean in his one acre of land for seed production purpose. He got a seed yield of 350 kg/acre & selling it @ Rs.200/kg, with a gross income of Rs.70,000/- & a net profit of Rs.55,000/-. Seed production in Raikia beans (local) is remunerative enterprises for the resource poor farmers ,Seed treatment , line sowing, use of staking materials, use of bio fertiliser and INM , IPM practices resulted in production of good quality seeds, with seed yield of 3.5qtl / acre Seed production in raikia beans gave a net profit Rs.55,000/ acre with Benefit –cost ratio of 4.6.

**Impact:-**The intervention of the K.V.K on the cultivation of Raikia bean and its seed production is widely accepted by the resource poor families and efforts have been concentrated for horizontal expansion of the enterprise. Support services like availability of staking materials, seed treatment chemicals, availability of vermi compost and bio fertilisers s have been strengthened. Sri Dauda Mallick is now a successful seed producer in the G Udaygiri block, and he is supplying the seeds to the neighboring farmers as well as farmers and traders from different blocks like Tikabali, Raikia, Daringbadi are purchasing the seeds from him. This year he has planned to take seed production programme in his two acre of land. Sri Mallick is now a successful seed producer with secured future and also becomes an inspiration for many farmers.



### Success Story -3

**Name of the KVK :-** Kandhamal

**Title:-** Soil liming in Groundnut

**Introduction :-** Kandhamal district is one of the undeveloped district of Orissa and the farm families of the district are mostly marginal and small farmers with low socio economical status . Due to undulated, hilly and sloppy topography, of the district majority of the cultivable land comes under acid soil . About 74% soils of the Kandhamal district is acidic in nature. The productivity of major crops grown in the district is significantly low as compared to district average due to soil acidity. The application of lime to the soil neutralises soil acidity and creates favourable environment for microbial activity, nutrient release and their availability to plants.

**KVK Intervention :-** Krishi Vigyan Kendra , Kandhamal has initiated various activities among the farming community to the address the problem of soil acidity & low productivity of major crops. Intervention programmes like soil health campaign ,training programmes on acid soil management, distribution soil health card basing on soil sample testing from farmers field & demonstration on application of PMS were under taken.

**Output :-**The KVK ,Kandhamal conducted demonstration on application of lime in Groundnut in three adopted villages in Kharif 2009.In this demonstration programme Groundnut HYV var-TAG 24 was taken. Application of lime @5 q/ha in furrows 7 days before sowing with FYM @ 5ton/ha along with soil test based fertilizer application and need based plant protection measures.

In the demonstration programme the average productivity of Groundnut was recorded 17.9 q/ha with an increase of 67 % over conventional practice with a net profit of Rs.26,570/-/ha. The pH of soil after harvest was recorded 6.4 as against 5.5 before application of PMS. Field days were organised at farmers field to popularize this technology & has created awareness among the farmers about application of lime to ameliorate soil acidity & increase soil fertility

**Outcome :-** By adopting this technology the yield has increased 67 % over farmers practice with a net profit of Rs.26,570/ha with Benefit –Cost ratio of 2.8.

**Impact :-** The out come of the technology has motivated the farmers to apply soil amendments like lime application in form of PMS, soil test based fertilizer application to enhance the productivity of crops & last year 2552 MT of PMS were supplied to the farmers for soil amendments Due to application of PMS the productivity has been increased significantly

