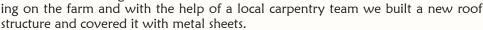


Newsletter 12 October 2019

The summer is generally a time of giving attention to maintenance projects, various, needed upgrades, and creation of new infrastructure on the farm.

This year we dedicated a lot of our resources and time to renewing the roof of the old cow house; the approximately 25 year old thatch roof needed badly to be replaced.

We had Hardwickia binata tree timber growing on the farm and with



The main work is done but still needs finishing; we also want to create a loft under the roof to store the paddy straw which keeps the stall cool, and the straw dry and easy to access for feeding to the animals.

The renewing of the cow house roof, step by step:



Taking down the thatch roof



Almost done



Taking down the wood structure



without roof structure



carpentry work for the new structure



Adding the roof sheets

Short updates and summer news

Foot & mouth disease aftermath

As reported in the last newsletter (May-June), our herd of cows got foot & mouth disease at the beginning of



this year. This gave us a lot of extra, unexpected work and reduced our cows' milk output substantially. And as expected, there was a bit more to come; since then quite a few of the animals are not getting pregnant and a number of cows have cracked hooves, which is something we never have seen here before and seems also to be an outcome of foot & mouth disease. Cracked hooves can easily lead to foot damage and infections.

We are treating these cows with a variety of homeopathic medicines and hope that over time these symptoms will slowly disappear.



Tarun

The volunteer from Chennai, who has been with us for 1.5 years has left the farm and is

following a yogic course in Coimbatore.

It was great to work with Tarun. He was totally involved in organizing and overseeing the digging of the new ponds last year; he had been experimenting to reduce weeding cost in the rice; and was exploring ways of improving our small poultry.

He also helped to create a farm database where all the many activities and transactions are being entered and monitored. We used to keep track of our work through a wide range of Excel workbooks, but this became too unwieldy. From his current location he is still helping to make improvements and weed out any bugs in the system; these come into play when the reality does not want to get squeezed into a logic framework. Besides all that, he helped with many other ongoing activities on the farm.

Thanks a lot Tarun, and wish you all good on your way.

Looking back, being here today and anticipating the future

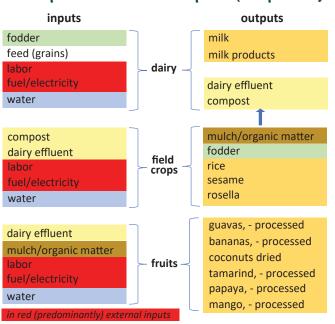
When we started to deve<mark>l</mark>op Annapurna in the nineteen-eighties we were very concerned about the environment and the farm functioned with a windmill, biogas, animal traction and solar energy. But over the years we realized that sticking rigidly to these values would basically mean we would produce very little food and Auroville would have to buy more conventional rice / millets and dairy products from the open market. Realizing this we decided to be less green and more productive to serve the community better. Our products were not as environmentally friendly as we wished but still much greener than conventional food from the Pondy market.

Looking at the world today we do realize that we have to move towards more sustainable practices. Reading reports about agricultural developments worldwide we really have to take stock and move towards better ways.

If I look at the farm with a critical eye, I rate our water sourcing as pretty good since we harvest all that rain water and use relatively little deep



Annapurna farm in-outputs (simplified)



groundwater. The distribution of water needs ongoing improvements so that we use the water more efficiently.

Our energy use is high and I am appalled by the diesel / petrol / electricity guzzling machines we operate. To make a change in energy-usage will be very challenging, and we will need both human resources and financial support to improve on that front.

We have a wonderful cow herd but still feed substantial amounts of grains to the animals. These grains are mostly millets and actually fit for human consumption. Our vision is to slowly move away from these grains, to be used to feed the animals, and grow more fodder throughout the year. This will cost us more water, labour and will probably reduce milk production. We will also try innovative methods to conserve fodder from the wet season to be used in the dry summer.

Since the dairy is the financial engine of the farm we have to treat this very carefully.

We will come back to these issues in future newsletters when they come up in the years to come because I think they are of utmost importance. The farm will stand or fall depending on how successful we will be able to transform Annapurna into a more sustainable place.

New banana plantation



We are preparing a new banana plantation with about 600 banana plants. This entails putting up an electric fence to protect the plants from the wild pigs, deer, and the village cows that wander in from time to time. Then, once fruiting starts, we have to keep certain humans at bay as well..

For this plantation area we needed to expand the irrigation system and install mini sprinklers.

The work is still ongoing but the bananas were planted and are starting to grow.

This is the first phase during which we will assess the water, labor, and nutrient inputs. All of the work done is with a

hope to double the plantation next year. The plan is to supply more bananas to PTDC because they are buying yearly 11000kg of bananas from the Pondicherry market. Since we expanded our rain water harvesting system last year we think we can irrigate the plantation mostly with harvested rain water.

One of the big challenges will be to deal with the fluctuation in harvest. Since we are not artificially ripening fruits there will be times with more production than we can consume, especially during warm summer months with less consumers around. We will also have to change our



mode of transport to get the fruits to Foodlink because bananas are bulky and heavy.

Our bananas will be mainly the yellow Karparavalli variety a.k.a. Sri Aurobindo banana

We inter-planted the newly planted banana suckers (young banana plants) with a rosella crop, green manure, and leguminous cow fodder.

We hope to harvest the first bananas approximately 12 months from now.