Tanca Idle is a biological Farm born in 2011 and located in the west-cost of Sardinia, Italy (Lat:40.701138/long 8.424334)

It extends along a 25 acres of land there where 200 purebred Sardinian sheep graze freely.

The sheep in Sardinia is a precious heritage and representing more than 40% of the Italian national heritage and breeding of this species covers 13 thousand livestock enterprises (Istat, 2009; Istat, 2010).

Sardinia is one of the most important EU regions for sheep dairy production. It has more than 3.5 million sheep (3.7% of the EU total in 2009) that totally produce more than 300,000 MT of milk. This quantity corresponds to about 4% of total world production (Istat, 2011; FAO, 2011; Eurostat 2011) and the sheep milk is processed into different types of cheese. Sardinia produces approximately 50–60 thousand MT of cheese a year, manufactured by more than 50 dairy factories, about half of which are cooperatives.

More than half of the cheese produced is Pecorino, one of the most important sheep cheeses in the world. Approximately 70% of production is exported, with 80% of the export going to the USA.

We are equipped with building structures and machineries that allow the recovery of the sheep and smooth conduct of the extensive farming .

The Farm's business is based on the production and selling of lambs for slaughter (IGP) as well as high quality fresh milk which is then used to produce dairy products (Dop).

My company has benefited from the contributions funded by the European Union that have helped me to start my project, allow you to make improvements every year and allow me to keep the balance of the company balance sheet

I am the manager in my Farm, thanks to this activity I am able to combine my passion for animals with my passion for Veterinary Medicine , research ,Love for animals and a strong belief that the future of young people in returning to the countryside.

I am at my 4th year of studies and I am also doing an internship in the Department of Parasitology at the University of Veterinary Medicine located in Sassari. Thanks to this assignation, in agreement with my teacher professor Antonio Scala and Dr.

Antonio Varcasia, I decided to do my thesis on the study of gastro intestinal (SGI) and pulmonary (SBP) nematodes present in the sheep andin the goats of my Farm. These nematodes, called “gastro-intestinal strongilosis”, are the primary cause of death and loss of income of the Tanca Ilde Farm. We are talking about a complex form of parasites belonging to the family of the Rhabditidae, as well as the Tricostrongylidae, Stronglidae and Ancylostomidae. The “gastro-intestinal strongilosis” are caused, in sheep as in goats, from these types of parasites: Dyctiocaulus, Prorostrongylus, Muellerius e Neostrongylus. The SGI is found in the digestive tract, while the SBP lies in the broncho-pulmonary system. They are round and long shaped worms various sizes and colors. Animals are very sensitive to infestation during the period of oestrus and during childbirth. Once ingested by sheep during grazing on the lawns or waiting in the barn or while breast-feeding the infective larvae migrate through the body and reach their elective sites of various organs, causing anatomical lesions such as variable forms of pneumonia, bronchitis as inquiries concerning the respiratory system and gastritis and enteritis with regard to the apparatus gastroenterico.Questo type of injury can be cured if they are at an advanced stage otherwise if neglected or not treated effectively have various effects on the animal:

Weight loss, abnormal heat, infestation of lambs during lactation, decreased milk production and in more severe cases the death of the animal The parasites are therefore an important issue that is often overlooked or ignored by farmers and this causes serious damage to the farm and animals.
My choice to introduce the innovation of the research was precisely dictated by the need to limit the damage caused by the parasites.
Doing what I can achieve a thorough study of the parasite in my usual herd
the causes of infestation and possible solutions for the proper management of the parasites to obtain a benefit in my management.
I would also like to share with you another important research initiative which was attended by the company farmlands ilde:My Farm was involved in the research carried out by Dr. Francesco Dore, the research consisted in monitoring the sheep of Tanca Ilde to determine the presence of zoonosis (cause of significant loss of profit and as well of human deaths) : the Cystic Echinococcosis induced by the Echinococcus Granulosus.

Sardinia was the first Island victim of the Cystic Echinococcosis. From the years 2001 to 2010 the island suffered 1.502 hospitalizations with an average annual rate of 6,5 patients for every 100 thousand inhabitants and a national average of 2,3 cases.

The disease is still endemic and doctors are still working on finding an effective vaccine.

A new and innovative monitoring system has been used on the sheep of Tanca Ilde, and on those of the surrounding areas of Sassari, Nuoro and Cagliari, consisting of an ultrasound probe that identifies the idatidee liver cysts thus permitting the intra vitam diagnosis that would otherwise not be possible. Added on to this was the anatomic pathological examination of the intestines of the dead sheep.

In the Tanca Ilde Farm the rate of parasitosis that was found was of a 40%.

The study of the nematodes happens through a monthly sampling of stool of every single divided in different groups: Primiparous (sheep at first calving), young (sheep from 24 to 36 months of age), adults (sheep above 4 years of age) and another mixed group free from any kind of treatment.

The samples are transferred to the Department of Parasitology there where we identify the component of parasites in each and every one of the samples using the baermann method, the mac master and the copro culture, then we count the oocysts and with a stereo microscope we do a morphological examination of the adult parasite. We found a greater and major number of parasites such as : Neostrongilus Linearis and Muellerius Capillare (sbp) Haemonchus Contortus (sgi)

The data is recorded on a monthly basis and if there is a high percentage of parasites (upg>1500) we subscribe a specific cure and then study the response of the parasite to the prescribed molecule.

In the past 8 months the sheep have been treated 2 times (before delivery and during lactation) with the moxidectin molecule at the dose of 1 ml/5 kg p.v. (equal to 0,2 mg of moxidectin/kg p.v.)

Studying the registered data we noticed a 30% of death decrease from pulmonary and gastro-intestinal strongilosis and a clear improvement of the quality of life of the sheep and especially an increase of the production of milk (20% more compared to the year 2013.

It would therefore be advisable for farmers to perform some tricks : The environmental control strategies can be resumed as follows: avoiding animals from different farms to share the same pasture; avoiding animals of different age classes to graze together; parcel the pastures to permit a rational rotation; rotational grazing of pastures according to the seasonal development of parasites; stocking rate; young animals grazing ahead of the older animal ones; crop management practices

(draining, ploughing, harrowing, scrub clearing, fertilizing, etc.). These measures make the habitat less suitable for the free-living stages of gastrointestinal strongyles, reducing the potential of infection of the same pastures.

it would also be advisable to recommended that farmers periodically carry out the examination of the stool for the research of parasites, it is a fast procedure, economical and it's not particularly invasive. This procedure prevents all the expenses that the farmer usually spends to cure the animals afflicted by this parasite, if the parasite isn't caught on time the treatment may not be effective.

It is worth doing a diagnosis examination before treating for parasites so that the farmer can make use of a specific type of molecule to cure the specific type of parasite. So doing we will slowly impede the Pharmaceutical Resistance, developed due to the improper use of anthelmintics.

For a correct and fruitful collaboration between researchers and farmers would be useful to provide farmers good methods of information.
It would also provide useful tools for prevention through free classes or information campaigns so that the farmer is aware of the risks and solutions simple and inexpensive and can be implemented.
The researcher can thus benefit from a study piu'esteso, regular in-depth on the parasites and parasitic and work more easily with scientific solutions to be put at the disposal of the farmer and of science!
In Italy and in specific in Sardinia a few years various research institutes including the faculty of veterinary medicine of the university of Sassari offer to the farmer who puts his company at the disposal of the study, a research and monitoring access.

Companies that can make a claim of this, however, there are still few for lack of funds to research institutions.

Minister for Agriculture and Forestry has promised that it will promote scientific research in the field of agriculture, food and forestry.

A This regard I would like to mention a recent Ministerial Decree 4539 of 26 February 2014 concerning the grant of assistance for the implementation of programs of promotion, dissemination and transfer of research results and the agricultural experimentation.

The role of research is important because it is through innovation in agriculture that we can carry on and grow the culture and the strong tradition of the Italian agro-food products.

In Sardinia is also very useful work of ARAS: It is a member dell'A.I.A. Work in harmony with agricultural planning with regional and national associations for the species and breeds of livestock and fields of activity.

The breeder registered all'Aras can with a small annual fee to benefit from monitoring, inspections and technical assistance on the cattle of your company.

In last four years, due to the economical crisis, funding and grants for researche were reduced in Italy. So a collaboration between farmers, producers and research institute is a concrete form to push up research in a "low cost" form, and should be encouraged.

A helping hand to the farmer and a helping hand to search.hands shaking in a promise of long-term collaboration.