Harmonizing Community-based Animal Health Service Delivery in the Somali National Regional State, Ethiopia

Proceedings of a workshop held in Jijiga, Ethiopia
March 26th-28th, 2002

Compiled by Berhanu Admassu
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I am glad of taking this opportunity to extend my appreciation to all NGOs and participants of the workshop for their constructive inputs and anxiety towards the CAHW projects best possible future.
<table>
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<tr>
<th>ACRONYMS</th>
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<tr>
<td>ACORD</td>
<td>Action for Research and Development</td>
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<tr>
<td>AHA</td>
<td>Animal Health Assistant</td>
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<tr>
<td>AHT</td>
<td>Animal Health Technician</td>
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<tr>
<td>ACF</td>
<td>Action Contre la Faim</td>
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<tr>
<td>BCO</td>
<td>Branch Coordination Office</td>
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<td>CAH</td>
<td>Community-based Animal Health</td>
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<tr>
<td>CAHW</td>
<td>Community-based Animal Health Worker</td>
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<td>CAP</td>
<td>Community Action Plan</td>
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<td>CAPE</td>
<td>Community-based Animal Health and Participatory Epidemiology Unit</td>
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<td>CCP</td>
<td>Contagious caprine pleuropneumonia</td>
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<td>COOPI</td>
<td>Cooperazione Internationale</td>
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<td>Ministry of Agriculture</td>
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<td>Non-Governmental Organization</td>
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<td>National Veterinary Institute</td>
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<td>Pastoral Association</td>
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<td>PACE</td>
<td>Pan African Programme for the Control of Epizootics</td>
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<td>Pan Africa Rinderpest campaign</td>
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<td>Pastoralists’ Concern Association of Ethiopia</td>
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<td>PRA</td>
<td>Participatory Rural Appraisal</td>
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<tr>
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<td>Save the Children of the United Kingdom</td>
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<td>Save the Children of the United States of America</td>
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<td>SERP</td>
<td>South East Rangeland Project</td>
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<td>ZAD</td>
<td>Zonal Agricultural Department</td>
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1. Introduction

Livestock is the mainstay of the pastoral and agropastoral people who occupy the more arid and semi-arid areas located around the periphery of Ethiopia. These people keep large numbers of livestock, which are required for their subsistence. Also livestock provide long-term security in the event of epizootics and droughts. Livestock development is constrained, amongst other important factors, by a wide spectrum of diseases. The animal health service is mainly located in the highlands and very poorly serving the pastoral societies. Animal health personnel in these areas are few in number and cannot cover such a vast area to adequately address the veterinary needs of livestock keepers. Besides, government staff need adequate mobile facilities, for which currently does not have the capacity to provide.

In view of these limitations the time has come to consider alternative approaches to improve animal health service delivery in the pastoral areas. This includes the training of CAHWs and extends all possible supports in order to provide the much needed services where other sectors are hardly operational. A start has been made in developing these approaches in the pastoral and agropastoral areas of the Ethiopian. Consequently, community-based animal health service delivery systems in the Somali regional state are growing in number; there are currently about more than eight projects.

The community-based approach is receiving attention from the Ethiopian government and there is increasing evidence that the approach improves service delivery at the livestock owner level, and, can also be very useful in the collection of information about disease situations. This is true not only of those diseases that are of immediate interest to farmers, but also those that are of national and international significance, either because they have major transboundary significance, are the causes of major epidemics, are of major zoonotic significance or affect international trade.

However, implementation of community-based animal health services is still scattered and modes of implementation vary enormously. In order to address some of these problems a workshop entitled “Harmonizing Community-based Animal Health Service Delivery in the Somali National Regional State” was conducted in Bade Hotel, Jijiga, Ethiopia. Over 60 participants were drawn from PACE Ethiopia, Federal MOA Pastoral Extension Team and regional government bodies, teaching and research institutions, private practitioners and NGOs including HCS, SC(UK), OWS, CCM, LVIA, COOPI, PCAE and SC(US). These proceeding detail the presentations and discussions held during the workshop. The workshop aimed to identify the geographic distribution and the approaches used by different NGOs, and discuss the issues relating to the type of activities on practice, disease surveillance, reporting, and coordination of the service.

The specific objectives of the workshop were as follows:

1. To assemble and share information on who is implementing community-based animal health projects in the region.
2. To review rinderpest situation in the region and to discuss eradication options for an agreed strategy.
3. To work out and reach agreement on the model for optimal coordination of disease reporting and information sharing.
4. To identify the roles and responsibilities of different types of animal health service providers.
In addition, the workshop hoped to achieve the following specific outputs:

1. Raised awareness among the stakeholders on the delivery of animal health services in the Somali region and identified gaps existing and what needs to be done and by whom.

2. Shared experiences on the delivery of animal health services by the stakeholders in the region.

3. Developed a model for collaboration with the stakeholders in order to improve the disease reporting system in the region.

Two keynote papers were presented in the workshop. The first was on an overview of the delivery of animal health services in Somali regional state and was presented to highlight the importance of livestock industry and the level of animal health delivery system in the region.

The second keynote paper was on the development of community animal health services in Ethiopia. Participants were briefed on the benefits of professional participation, opportunities offered by CAH service delivery and the stumbling blocks facing the current animal health delivery system in the country. Lack of national policy and shortage of qualified manpower were stated as core problems. The presentation also covered the historical development and value perspectives of CAHWs’ training.

To be acquainted with who is doing what and where, all invited CAHW implementing NGOs were requested to provide a summary of their activities. A “who is doing what” mapping exercise was performed to show the animal health activities and livestock related activities being performed by the different organizations. From this exercise, some of the geographical gaps in coverage were identified.

To review rinderpest situation in the region and to discuss the eradication strategies in Ethiopia, a third keynote paper was presented on the rinderpest situation, control and eradication strategies, and the role of CAHWs in disease surveillance programme. It has been indicated that the Somali regional state is at high risk from a resurgence of rinderpest. This is a devastating cattle disease. Fortunately the disease has been eliminated from the country after extensive and expensive campaign, but with two remaining foci in southern Sudan and southern Somalia. As Ethiopia has ceased vaccination, any recurrence could be a disaster of cataclysmic proportions. It is considered imperative to develop animal health systems in high-risk zones capable of early detection and appropriate response to any flare-ups. This would be an intrinsic part of the CAHW system, and is clearly one of the major benefits that a CAH programme can bring to the national veterinary services.
2. Keynote Presentations

Overview of Animal Health Services in the Somali National Regional State

Dr. Abdulahi Hussein Yusuf
Head, Animal health Department, Livestock, Environment and Crop Development Bureau (LECDB)

The Somali National Regional State (SNRS) is located in the southeast part of the country. It covers 333,400km² and is administratively divided into nine zones and 39 weredas. Somali society is largely a pastoralist society, which has adapted over many years to survive in a semi-arid and arid environment. The SNRS has huge livestock resources, 23,600,000 livestock population figure and 85% people in the region are pastoralists according to study report of ISP in 1999. Regarding the regional animal health service delivery, lack of facilities such as means of transportation, operational budget, infrastructure and also shortage of qualified manpower have been hampering the extension program highly. Currently there are 15 veterinarians and 57 AHAs employed by government in the SNRS.

The South East Rangelands Project (SERP) has been representing the public veterinary section in the area for a long period. However, since June 2000 SERP has been amalgamated with the Bureau of Agriculture (BOA) and is now called the Livestock, Environment and Crop Development Bureau (LECDB). As a result of the termination of SERP and political instability problems, there has been no veterinary service delivery by government in the SNRS during the last three years. No veterinary inputs were purchased and field service delivery practice was not implemented.

In this regard NGOs have been the only bodies providing veterinary services in the region after SERP termination. In addition to the NGOs, skilled herders who have received training during the Vet Scout and Paravet training programmes of the Jijiga Range Development Unit (JIRDU) and SERP have been serving pastoralists.

More than 1000 CAHWs are operating in the region. However, as the region is very vast and shares a long border of around 2050km with Kenya, Djibouti and Somalia, still far more manpower is needed to meet demands. Communities are highly mobile and livestock across borders is so frequent, there is high risk of transboundary diseases entering the region.

The regional government understands the role of a decentralised veterinary service delivery program, especially the CAHW system in order to the demand from herders for veterinary services. Moreover, the region has already endorsed the CAHW system as part and parcel of the veterinary extension delivery strategy and included it in the 5-year plan recently developed.

Promotion of veterinary service privatisation in the region has also formed part of the 5-year plan now under implementation. It is true that the NGOs working in the area of livestock health are helping the regional government significantly. The challenge to the private sector, the CAHWs and herders is the in-flow of poor quality drugs coming through our neighbours illegally, mainly in Kenya and Somalia.
Community-based Animal Health Service Delivery: The benefits of veterinary professional participation and opportunities of CAH service delivery

Berhanu Admassu
Veterinary Field Officer, OAU/IBAR/CAPE Unit

An alternative approach to reaching the remote pastoral community with clinical veterinary service has been to promote the use of community-based animal health workers (CAHWs). Many NGOs and the Government have established or are in the process of establishing community-based animal health programmes in Somali Regional State. Community-based animal health programs have become very popular and have been implemented by many NGOs and the Government under various circumstances in the pastoral areas of Ethiopia.

The ultimate success of a community based animal health program depends in large part on the active participation and support of the professional veterinary community at the local, regional and national level. In turn, a successfully operating community based animal health program offers a number of distinct opportunities and benefits to organized professional veterinary medicine at the local, regional and national levels. In this paper, the purpose of community based animal health programs is presented. The implementation process is reviewed and the important roles of professional veterinarians and organized veterinary medicine throughout the implementation process are highlighted. Also, the opportunities and benefits which successful community based animal health programs offer to the professional veterinary community are discussed.

The purpose of a Community-based Animal Health Program

The primary purpose of a community-based animal health program is: to reduce morbidity (illness) and mortality (death), and thereby increase the productivity of local livestock by improving the access of rural livestock keepers to affordable, basic animal health services.

This is accomplished through the selection and placement of community-based animal health workers who are trained to recognize, and equipped to treat or prevent, a selected and specific group of diseases and conditions previously determined to commonly affect local livestock.

The rationale behind the community-based animal health care concept is that, while a wide range of diseases may potentially affect livestock, the overwhelming majority of morbidity and mortality in any given locality is caused by a finite set of common and predictably occurring disease problems that are conditioned by local geography, climate, and animal management systems.

For community-based animal health programs to be effective, these common diseases must be accurately identified. Then, CAHWs must be trained to properly recognize and treat (or prevent) this finite set of common disease conditions, on a fee-for-service basis.

Through the activities and interventions of these CAHWs, the community through improved animal health and production can realize substantial improvements, even though direct access to the full array of clinical services potentially available from a fully trained veterinary professional may still be lacking.

The effectiveness and reliability of individual village based workers can be greatly enhanced if they work as a network under the supervision and support of a professional veterinarian at the district level.
Cooperation and participation of veterinary professionals/authorities in the implementation of a Community-based Animal Health Program

The elements of veterinary professionals necessary for the successful implementation of a sustainable community-based animal health care program are summarized as follows. Note that even if the training of CAHWs to deliver veterinary services is legal, professional veterinarians in the area may resent the introduction of CAHWs into a village or district. Every effort should be made to diffuse that resentment.

- It is critical to enlist the involvement and support of local veterinarians and veterinary authorities in the program development as early as possible.

- There are many opportunities for their participation throughout the entire implementation process and these opportunities should be capitalized upon.

- It must be demonstrated to local veterinarians that CAHWs are not competitors but rather, extensions of their own influence and importance within the community.

- By having veterinarians participate in supervisory and supportive roles, such as training, monitoring, and drug supply, the long-term prospects for success of the program can be bolstered and the entire framework of veterinary service delivery in the pastoral areas of the country can be favourably influenced.

- An appropriate training curriculum and enthusiastic, supportive trainers are necessary to develop competent and effective CAHWs. It is critically important that veterinary professionals actively participate in the curriculum development.

- It is essential to avoid turning the training course into an intensified, condensed version of a complete veterinary school curriculum.

- The challenge is to identify and capitalize on the indigenous knowledge that local livestock keepers already possess with regard to anatomy, physiology and disease processes; to integrate that knowledge with some core principles of veterinary science, such as the germ theory of disease; and then, to add specific, practical information concerning the proper identification, selection, and use of the particular set of drugs, vaccines, and equipment with which the CAHW will be provided.

- With a well-designed curriculum and supportive trainers, even non-literate livestock keepers can be suitably trained to perform successfully as CAHWs.

- One key element is to have respectful trainers who can put educational snobbery aside and build on the strong base of knowledge that livestock keepers have about their animals, derived not from books, but from years of close association and experience. Whenever possible, trainers should be local people, known, accepted, and respected by the community.

- Once trained CAHWs begin working in their communities, it is vital to the overall success of the program that their technical and personal performance be regularly evaluated. CAHW activities should be monitored and feedback solicited from community members regarding the effectiveness and impact of CAHW work. This needs to be followed up with performance evaluations between CAHWs and qualified monitors, and with opportunities for retraining, when necessary. Training schedules should allow some trainers to also serve as field monitors, as the opportunity for trainers to see the field performance of
their graduates will help them to fine tune future training programs. Veterinarians, either private or government, can also serve as monitors. This is a valuable way to engage the participation and interest of local veterinarians in the community based animal health program and to ensure that performance standards are being met.

- One benefit of training CAHWs to reliably recognize the most common diseases in local livestock is that it increases their awareness of the appearance of disease that they have not been trained to recognize. Therefore, when a new, potentially epidemic disease appears in a community, CAHWs may recognize it sooner and seek the assistance of veterinary authorities. This sort of ad hoc disease reporting will occur spontaneously at first, but it can be formalized as a CAHW function and integrated with existing government disease surveillance and control activities. In areas with poor communication and transport infrastructure, the opportunity for government to have extra eyes and ears in the field for early detection of potentially costly disease outbreaks can be extremely valuable for improving the efficiency of national disease control programs. This is clearly one of the major benefits that a CAHW program can bring to the veterinary profession and professionals.

- In most cases, it is the implementing agency, usually an NGO, that initially takes responsibility for the CAHW drug supply, including the identification of sources, ordering, warehousing, distributing, and bookkeeping. For the drug supply to be sustainable, and the project to be successful in the long term, the NGO needs to transfer this responsibility to some organization, group, or individual veterinarian. It may fall to the NGO to assist in the development of appropriate business and management skills to ensure that the privatisation of the drug supply is properly achieved, but this is a worthy and vital activity to veterinarians. Ultimately, the best solution is for drug supply to be managed by a licensed, private veterinarian either in clinical practice, or as proprietor of a veterinary pharmaceutical business.

Integration with professional veterinary services

If a sense of trust and cooperation has developed between CAHWs and local veterinary authorities during the development of the community-based animal health program, then every effort should be made by the implementing agency to capitalize on those gains and facilitate long-term cooperation.

Wereda veterinary officers may assume responsibility for regulatory oversight of the CAHW drug supply, serve as trainers, clinical consultants or field monitors, and conduct continuing education programs.

In turn, CAHWs may provide valuable disease surveillance and reporting functions, and can be hired or recruited by government, when circumstances demand, to assist in mass vaccination campaigns or quarantine efforts related to emergency disease control.

Creating a sense of mutual reliance between the community-based program and government authorities may be the most significant aspect of ensuring sustainability of the community-based animal health program.

The government veterinary services gain because epizootic and enzootic diseases are more quickly reported and reliably controlled - resulting in increased livestock production. The government services are more able to utilise their finite resources for the public good through

- continuing professional education of government staff,
- quality control monitoring of the provision of privatised clinical and vaccination services,
- standardisation of training levels,
- enforcing the laws governing the supply and use of ethical medicines,
- disease surveillance,
- movement control.
Opportunities of a community-based animal health service delivery

Presence of a community based animal health service delivery presents tremendous opportunities not only to CAHWs and Pastoralists who benefit directly from the services but to vets and the state as well.

Veterinarians should not feel that another cadre is created to compete with them but to view them as a primary animal health care cadre that is there to assist vets perform their duties. While a lot of masons/artisans build many houses, not only in rural areas but in towns as well, the Civil engineering profession has not felt threatened by them but has harnessed these to help them. The veterinary profession should adopt the same approach.

CAHWs as primary workers for disease surveillance and monitoring

Many diseases in rural areas are not reported because there is nobody to report them. By training CAHWs to report these diseases the number of reports will increase. All cases treated and diagnosed by CAH programme are reported to their respective NGO structure and these cases were not forwarded to the Ministry of Agricultures’ epidemiological unit because the system of reporting diseases restricts CAHWs reports to be sent to the ministry. A format of reporting diseases from CAHWs should be designed so that this tremendous opportunity is utilized.

CAHWs in trans-boundary disease control

Because of their position in the community, CAHWs can be used to mobilize their communities as well as to do vaccinations. Because of their links to supervising vets, in future, contract type vaccinations for diseases like CBPP / PPR in Pastoralists areas should be given to those vets with CAHW networks. This will not only increase coverage but will give CAHWs an income earning opportunity.

CAHWs in Research

Pastoralists possess rich detailed information on animal health matters, the presence of CAHWs will not only make this knowledge accessible but will allow the identification of other animal health concerns of pastoralists which can be researched upon to provide solutions. This will allow researchers in FVM and National Animal Health Research Center to concentrate not only on those high quality research topics, but of little consequence to the pastoralists, but also do research that will produce something that can be used by pastoralists.

Conclusions

Community-based animal health programs can provide immediate tangible benefits to poor livestock owners and can also serve as effective tools for social and economic development in poor, rural communities. Such programs therefore have received much attention in recent years and have become popular with NGOs and other development agencies. However, community-based animal health programs are not a panacea.

There are risks associated with their introduction. Any of these errors can lead to the community’s disillusionment with the program and a loss of trust in the implementing strategy. Even when the program is properly organized and implemented, lack of cooperation or participation of wereda veterinarians or local government authorities can undermine the effectiveness of the program and speed its demise.

For these reasons, professional veterinary inputs and the cooperation of local authorities are critical elements in building a successful program, right from the beginning.
With the above circumstances it is recommended that veterinary authorities, associations and privatisation schemes in Ethiopia should act to do the following:

- Recognise and certify the roles played by CAHWs,
- Enact policy and legislative reform to allow veterinary supervised CAHWs to be encouraged and legalised
- Formulate and establish start up schemes for private vets wishing to work in pastoral areas.

In most parts of the pastoral areas our experience has shown a demand for CAHW services in these areas, as such a legal and policy regulatory framework necessary for CAHWs should be put in place. Additionally, CAHWs should not be viewed as a threat to the Veterinary profession but as an opportunity to enable them reach livestock owners in remote and inaccessible places. From that point of view, CAHWs are also helpful to both the veterinary service and researchers. To use CAHWs, we are making the choice of saving livestock. Our ethics, laws, policies, regulations should recognise and accommodate this choice.

The Rinderpest Situation in Ethiopia: control and eradication strategies and the disease surveillance programme

*Dr. Tariku Sintaro, PACE Ethiopia Programme*

PARC Ethiopia was implemented in three phases:

**Phase I – 1989 to 1991**
- Blanket vaccination for 2 years
- Strategy were achieved and the programme reduced the prevalence of RP

**Phase II - Rinderpest control/eradication strategy- 1991-1994**

The country was divided into
- High risk areas
- Medium risk areas
- Low risk areas

**Phase III – from 1994**
- Placed great emphasis on surveillance
- Endemic areas
- Sanitary cordon areas
- Epidemic areas
- Areas regarded as free from rinderpest
- Vaccination was carried out in endemic and sanitary cordon areas

**Rinderpest vaccination**
- Coordinated by 8 Branch Coordination Offices
- 57 million cattle vaccinated

Table 1. Vaccination achievements (as millions of animals vaccinated)

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<th>Year</th>
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<th>Achievement</th>
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<td>2000</td>
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PARC Ethiopia declared provisional freedom of disease on a zonal basis of 1st May, 1999.
Pan African Control of Epizootics (PACE) in Ethiopia

Specific objectives:
- Improvement of disease Control
- Disease Control Capacity Improved
- Availability of Veterinary Services Prompted
- Reintroduction of Rinderpest Prevented
- National Network is implemented

Components of the Project:

Reinforcement of Government Services
- Improvement of diagnostic & disease surveillance
- Implementation of emergency preparedness Programme
- Implementation of disease reporting system
- Implementation of private veterinarians in disease control
- Development of communication and training

Rinderpest eradication
Conditions:
- PARC structure is unchanged
- Rinderpest is not detected
- Comply with OIE pathway
- PANVAC certified vaccines
CBPP and other epizootic disease assessment

Risks & Flexibility
- Re-incursion of the disease from neighboring countries
- Control of CBPP will difficult unless existing tools are improved
- Surveillance may lead to new emergency diseases

Disease Reporting

The need for information in animal health

Information is a key element and a basis for animal health programming. It is used for planning, implementing, monitoring and evaluation of animal health programs (disease control or eradication). Hence, to avoid wastage of resources it should originate from reliable & accurate data. It should be analysed using modern scientific methods and technologies.

Types of information needed in animal health

The information required is huge. The minimum required is data on:
- Livestock population i.e. population at risk
- Types of disease occurred
- Disease distribution in time and space
- Impact of each disease such as: number of animals diseased, dead, slaughtered, etc.

Accurate information assists decision makers

Information collected assists decision-makers in:
- Formulating policies, setting disease control or research priorities,
- Detecting herds needing special attention,
- Detecting factors depressing herds productivity and production targets,
- In providing information required to meet international obligations, such as OIE, FAO, RADISCON etc.
- In supporting disease control/eradication programs e.g. rinderpest control
- In evaluating disease control programs (PARC, FITCA, NTTIC)
- In identifying any emerging diseases e.g. RVF, ECF,

Sources of animal health information

The major sources of animal health information are:
- Field veterinary services – veterinary clinics
- Research and diagnostic labs.
- Disease control centres or projects such as NTTIC, PARC
- Research and teaching institutions (ILRI, FVM, AU)

In developing countries like Ethiopia, the main source of animal health information is usually the data obtained from the Field Veterinary Service. This service works at grassroots level and maintains contact with livestock and their owners.
Disease reporting as a source of animal health information

In Ethiopia, monthly disease reporting from field services had served as the main sources of animal health information. This had been a long tradition and started with the establishment veterinary service in the country.

Disease reporting situation in Ethiopia before 1988

The IBAR reporting format was used. This was a single page format and the reporting unit was the wereda.

Drawbacks of the format were:
- Focused only on the presence or absence of a disease in the wereda.
- It did not give quantifiable information like number of animals sick, died or slaughtered due to the disease; animals at risk or measures taken.

In 1988, the old IBAR disease-reporting format was changed to the current OIE format (Office International des Epizootic) due to the reasons mentioned above.

The new OIE format

- Allowed to report detailed information on the outbreak occurred;
- Quantifies the impact of each disease on livestock;
- Can be easily analyzed to extract valuable epidemiological information;
- Clearly shows time and space distribution of the disease;
- Assists with evaluation of the efficiency of veterinary service delivery;
- This OIE format had been slightly modified by VEEU (Veterinary Epidemiology and Economics Unit) established under FLDP to suit Ethiopian conditions.
- The unit had also conducted various training of professionals, especially in FLDP areas on how to complete the report.

Features of OIE format

Page 1. Deals with General information, such as:
- Month and year of the report
- Location: Region, Zone, Wereda
- Blank space for extra comment
- Possible source of infection
- Factors contributed to the occurrence etc.

Page 2. Summary of outbreaks in the month;
- Types of disease occurred
- Numbers of outbreak in the month and number of active outbreak remained at the end of the month
- Species of animal affected
- Number of animals diseased, died, slaughtered
- Number of animals at risk
- Animals vaccinated for control or prophylaxis
- The information from page 2 is used for international reporting (e.g. to OIE)
- Calculations of important epidemiological rates such as:
  - Incidence/prevalence rates
  - Mortality rates
Case fatality rates (as a measure of severity)

Page 3. Outbreak detail: This page adds detailed information required to complete the information such as:
- Specific location of the outbreak in wereda
- If the disease is diagnosed or suspected
- The date the disease was observed and date it was report to the nearest veterinary clinic or post
- Ages of animal affected
- Types of farming system (mixed, pastoral, dairy etc.)
- VEEU had first established animal health information database in Ethiopia
- This database was an MS-DOS based PANACEA program
- It assisted in data entry, analysis of vital parameters, and preparation of reports

Limitations observed later on are:
- Working in MS-Windows environment
- Problem exporting and usage in other Windows Application
- Year 2000 compatibility

Hence, PARC Epidemiology Unit changed the database to Windows based MS-ACCESS program last year. This database is:
- Flexible and handy to entry data and make analysis
- Easy to prepare reports;
- Unlimited exportation facilities to other applications

Past disease reporting experience
1. Before 1988, IBAR reports filed by weredas;
2. It had limited return rate due to few professionals at wereda/awraja level;
3. Limited interpretations were derived as no quantifiable data was supplied;
4. No computer database was used to analyze the information.

Current disease reporting situations
- Disease reporting had started increasing with establishment of VEEU by FLDP, especially from FLDP project areas
- Between 1990 -1995 the national reporting rate increased from 2.15% to 11.91%
- After the phase out of FLDP, there was no responsible unit to overtake the functions of VEEU.
- Hence, PARC established the Epidemiology Unit in August 1995 to continue and extend what was started.

Objectives of the Epidemiology Unit
- Collect and analyze information on rinderpest, monitor and evaluate RP control strategies;
- To set up and develop functional procedures and routines in disease information collection, analysis, mapping (GIS), and disseminate the results to all concerned;
- Collect and review information on other epidemic diseases, such as CBPP, CCPP, FMD, PPR etc;
- Yearly assess national animal heath information status;
- Update information collection (format and mailing system);
- Plan and conduct training for professionals.

Progresses in reporting
- Qualitative and quantitative progresses had been achieved since 1995;
The national expectation is to reach at least 80% weredas in the country reporting 10 times a year, we are now close to 60% weredas reporting at least once a year;
The quality of reports is improving and number of reports rejected is reduced due to trainings given.

Constraints
1. Absence of regulation forcing professionals on compulsory reporting of disease outbreaks - minimum cooperation from Regional Veterinary Officers;
2. Low quality reports due to professional negligence or incompetence;
3. Unnecessary delays of reports to reach our unit due to less follow-up.

Active Disease Reporting

Reporting of syndromes associated with stomatitis-enteritis
- not a search for rinderpest but rinderpest-like diseases - Stomatitis-Enteritis cases
- if functioning correctly will detect, for example, BVD, IBR, MCF, FMD as well as rinderpest
- if functioning well, the veterinary services should receive about 1 case per 100,000 head of cattle per year

Active S-E Outbreak Reporting
Possible approaches to increase the number of Stomatitis-Enteritis reports received and properly followed up?

Top-down
- Include an obligation to report in the veterinary legislation
- Include this responsibility in the Terms of Reference for field staff
- Design record formats and regularly check their use (report, date received, date investigation, results, date samples forwarded etc.)
- Introduce zero-reporting for SE outbreaks and appoint per district a responsible person

Communication activity
- Create awareness among livestock owners and vet staff through a multimedia communication programme i.e. based on radio spots, posters and leaflets
- After vaccination has stopped it is part of early warning and thus rinderpest emergency preparedness
- Should be combined with...

Awareness creation of all veterinary staff:
- Preparation of SE case registers at all levels
- Preparation of training material
- Training of trainers - expert teams
- Training of field staff by these expert teams

Involve as many actors as possible:
- CAHWs
- NGOs
- Farmers’ organisations, livestock traders etc.
Active S-E Outbreak Reporting

**Stomatitis-enteritis outbreak investigation**

This involves all activities that relate to the investigation of reported outbreaks to determine its cause. It includes:

- clinical and epidemiological investigation
- sample collection
- laboratory testing.

There are three possible outcomes of a stomatitis-enteritis outbreak report:

**Outbreak Classification Scheme**

- Confirmed rinderpest
- Discard
- Review/rinderpest compatible outbreak

*Includes all outbreaks for which no definitive diagnosis was made and rinderpest was never ruled out. The goal of surveillance programme should be to keep this category as small as possible. This category should be periodically reviewed.*

**Laboratory confirmation**

Lab should provide a definitive diagnosis within an appropriate time.

- If rinderpest, this should be within a period of days.
- If not rinderpest, it should continue until a differential diagnosis is made in as many cases as possible.

**How to increase the number of Stomatitis-Enteritis outbreaks properly followed up by laboratories?**

- Assure that the right and sufficient numbers of samples are collected during clinical investigation
- Assure that the samples are preserved in the right way and forwarded in time
- Field staff should follow up the progress of lab diagnosis
- Training of lab staff
- Assure the availability of all material and reagents
- Improve the differential diagnostic capacity

**How are we going to set up this in the Somali National Regional state in particular and in the country in general?**
3. **Experiences with Community-based Animal Health Services in the SNRS**

**Community-based Animal Health Services: Experiences of the Harerghe Catholic Secretariat (HCS) in Shinille zone**  
*Dr. Derbe Begashaw  
Harerghe Catholic Secretariat Animal Health Section*

In Shinille the need for CAHWs service was justified based on the fact the public veterinary section was constrained by lack of transport and operational budget although more than enough manpower is there that no service was reaching the community before CAHWs. Herders in Shinille zone were already doing all sorts of treatment procedures using modern medicines during the base line survey and the fact was formed ground to train the CAHWs on injection procedures as well as others they are doing now.

The government AHTs have now become more active than before as they are busy with supervision of CAHWs trained by the project. Six motorbikes were purchased by HCS to be supplied to the AHTs, whom they already enabled to get driving license, for the supervision purpose.

In general the CAHWs trained under HCS are distributed in 6 weredas namely Erer, Shinille, Aysha, Dembel, Afdem and Meiso. 54 CAHWs were trained out of which 53 are operating and each CAHW has received kit of 1920.60 Birr value at graduation.

The CAHWs have been effectively operating that a total of 127247 animals were vaccinated against anthrax and pasturellosis while around 73271 cases were treated against external, internal parasites, wound and systemic infections in one year, 2000 to 2001.

**Community-based Animal Health Services: Experience of Lay Volunteers  
International Association (LVIA) in Moyale wereda**  
*Dr. Rudi Cassini*

LVIA, an Italian NGO, has been running veterinary service improvement program in Liben zone, Moyale wereda since 1995. The project out puts so far includes 7 veterinary health posts newly constructed, 5 maintained, 3 dipping bath construction and 28 CAHWs trained. Vaccines cost sharing system was introduced and CBPP, PPR, blackleg and pasteurellosis vaccination campaign in year 2002 was conducted. LVIA was organised a workshop on cross-border livestock interventions in Moyale in March 2002. The workshop was attended by NGOs funded by ECHO in Ethiopia and Kenya; other stakeholders from the region and national levels were participated.

**General strategy and objectives of the project**
- Improve animal health situation in the area (rehabilitation after the drought)
- Introduction of the cost-sharing system
- Strengthening of dry meat preparation as drought coping mechanism
- Awareness creation on animal diseases control and prevention
- Coordination of the interventions

**Sensitisation and community participation**
- Long experience in the area
- Two rounds of sensitisation jointly with the local governmental bodies
- Permanent sensitisation through the network of the CAHWs
Input - vaccination and treatment
- Vaccines and drugs purchase (partially recovered)
- Veterinary and field equipment
- Personnel (1 veterinarian, 1 AHA, 4 AHTs and 8 CAHWs)
- 2 Land Rovers (field and logistic)
- 2 months mass vaccination campaign
- 1 month spot vaccination campaign

Dipping activity
- External parasites (ticks): one of the main problem of the area
- Dip activity as improved treatment for ticks
- Cost sharing principle

Coordination
- Meetings with COOPI Kenya, PCAE and COOPI Ethiopia
- Participation to the LWG and different workshops
- Involvement of government local bodies at different stages of the project
- Cost sharing principle as the main issue of the coordination

Constraints
- Coordination at national and international level on veterinary service needs improvement
- Area accustomed to relief (“emergency?”) interventions
- Cost recovery is new to the area
- Poor support from national veterinary services (Debrezeit, Sebeta)
- Lack of enabling environment for CAHWs especially in the Oromiya regional state.
- Free vaccines delivery practice by the government was a challenge to the vaccines cost sharing principle of the project.
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CCM runs CAHW system under food security project in Kalafo and Mustahil weredas of the Gode zone. The project beneficiaries are pastoralists and agro-pastoralists that formed livestock as a base for their livelihoods. Diseases like CBPP, FMD, haemorrhagic septicaemia, trypanosomiasis, internal and external parasites, and tick borne have great importance to the livestock industry in the area.

The CAHW service delivery system was established in March 2001 in collaboration with the zonal agricultural office and SERP. Via a 20-day training, a total of 13 CAHWs were trained. CCM recognised that the CAHW service delivery system is of priority to provide basic animal health extension to mobile community. Further the indigenous knowledge of pastoralists on diseases makes the trainees efficient in grasping messages to transfer easily while the service consumers respect the skill of their people trained as CAHWs.

COOPI and PCAE are sister NGOs of the Italian government who operate in Filtu wereda of the SNRS. Filtu is one of the remotest pastoral areas, about 721 km away from Addis Ababa, in the southern part of the country. Like other similar pastoral area access roads, water, human and animal health service delivery centres are missing in Filtu.

Livestock production is the basic means of livelihood but is highly constrained by diseases, which again is aggravated by absence of veterinary service facilities of any kind in the area. There is neither single veterinary post nor animal health professional based in the wereda so far. However there has been CAHW system since 1998 to form the sole service delivery agency and there were 30 CAHWs trained under COOPI-PCAE programs. The CAHWs received 30 days initial course and 7 days refresher training's on annual basis since established.

The two NGOs have been also involved in some capacity building side activities to the area through the infrastructures laid down mainly 7 vet posts constructed and equipped. As a result of services extended by the CAHWs and the project veterinarian jointly there have been 130,000 vaccines doses administered while 9640 cases received treatments between August 2001 and March 2002. More over Ethiopian Birr 15980.70 and 6433.10 has generated from vaccines and drugs administered respectively along with 359 goats.

In general not only the service but also the idea of cost recovery was introduced to the community due to the CAHW system established. The NGOs believe that livestock productivity has improved due to the reduced animals’ morbidity and mortality events. The CAHWs cover a radius of 135km away from the Filtu station and the main road but communication between them and the projects has been affecting the efficiency of CAHWs, as input supply became difficult task. Clan conflicts and failure to get vaccines on time from the source, National Veterinary Institute (NVI), were also part of the problems faced.

The presentation underlined the need for private input source to the CAHWs in order to maintain the achievements obtained so far and the integrity of the system as a whole.
**ACTIVITIES ACCOMPLISHED**

A total of six mobile vaccination teams were dispersed at the major water points (ponds, rivers and boreholes) in the district to conduct the vaccination and treatment work during the month and the result of the vaccination work is summarized as follows.

**Vaccination**

Table 1. Total vaccinations given in doses per vaccination types per vaccination sites

<table>
<thead>
<tr>
<th>Vaccination site</th>
<th>Bovine pasturellosis</th>
<th>Blackleg</th>
<th>Ovine pasturellosis</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>Ahad</td>
<td>73</td>
<td>73</td>
<td>1028</td>
<td>1174</td>
</tr>
<tr>
<td>Bandheer</td>
<td>78</td>
<td>78</td>
<td>3082</td>
<td>3238</td>
</tr>
<tr>
<td>Bifatu</td>
<td>217</td>
<td>121</td>
<td>1381</td>
<td>1719</td>
</tr>
<tr>
<td>Bodbod</td>
<td>475</td>
<td>995</td>
<td>1437</td>
<td>2907</td>
</tr>
<tr>
<td>Higli</td>
<td>0</td>
<td>0</td>
<td>665</td>
<td>665</td>
</tr>
<tr>
<td>Harbali</td>
<td>15</td>
<td>0</td>
<td>1372</td>
<td>1387</td>
</tr>
<tr>
<td>Kurale</td>
<td>324</td>
<td>303</td>
<td>1312</td>
<td>1939</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td><strong>1182</strong></td>
<td><strong>1570</strong></td>
<td><strong>10277</strong></td>
<td><strong>13029</strong></td>
</tr>
</tbody>
</table>

**Treatment Service**

Table 2. Table showing the treatment service given during the vaccination program

<table>
<thead>
<tr>
<th></th>
<th>Ivermectin</th>
<th>Antibiotic</th>
<th>Anthelmintic</th>
<th>Trypanocidals</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>Camel</td>
<td>156</td>
<td>85</td>
<td>212</td>
<td>5</td>
<td>458</td>
</tr>
<tr>
<td>Shoats</td>
<td>8</td>
<td>27</td>
<td>285</td>
<td>0</td>
<td>320</td>
</tr>
<tr>
<td>Cattle</td>
<td>61</td>
<td>20</td>
<td>82</td>
<td>106</td>
<td>269</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td><strong>225</strong></td>
<td><strong>132</strong></td>
<td><strong>579</strong></td>
<td><strong>111</strong></td>
<td><strong>1047</strong></td>
</tr>
</tbody>
</table>

**Cost Recovery**

The following table shows the cost recovered during the month activity in the district.

Table 3. Table showing the cost recovery result, February 2002

<table>
<thead>
<tr>
<th>Vaccination site</th>
<th>Cash from vaccination service</th>
<th>Goats from vaccination service</th>
<th>Goats from treatment with ivermectin</th>
<th>Cash from treatment with ivermectin</th>
</tr>
</thead>
<tbody>
<tr>
<td>Ahad</td>
<td>173.70</td>
<td>3</td>
<td>2</td>
<td>763</td>
</tr>
<tr>
<td>Baandher</td>
<td>115.40</td>
<td>14</td>
<td>0</td>
<td>109</td>
</tr>
<tr>
<td>Bifatu</td>
<td>165.30</td>
<td>6</td>
<td>2</td>
<td>1090</td>
</tr>
<tr>
<td>Bodbod</td>
<td>597.30</td>
<td>7</td>
<td>0</td>
<td>-</td>
</tr>
<tr>
<td>Higli</td>
<td>199.50</td>
<td>0</td>
<td>0</td>
<td>-</td>
</tr>
<tr>
<td>Harbali</td>
<td>247.50</td>
<td>4</td>
<td>0</td>
<td>1199</td>
</tr>
<tr>
<td>Kurale</td>
<td>56.00</td>
<td>15</td>
<td>2</td>
<td>-</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td><strong>1554.70</strong></td>
<td><strong>49</strong></td>
<td><strong>6</strong></td>
<td><strong>3161</strong></td>
</tr>
</tbody>
</table>

Therefore, a total of 4715.7 ETB and 55 goats have been collected for the cost recovery strategy applied during the month.
**Goat mortality**

Health problems observed in the goats collected for the cost recovery strategy of the program and so far 80 goats have been treated with antibiotic and anthelmintic drugs in Melka Hagar and Bandher PAs. With so much input goat deaths have been reported from all goats herding sites and a total of 14 goats have been lost either for sickness or predators (hyena and lion).

Table 5. Goat deaths January to February 2002

<table>
<thead>
<tr>
<th>Site name</th>
<th>Number of goats died</th>
<th>Cause of death</th>
</tr>
</thead>
<tbody>
<tr>
<td>Berdale</td>
<td>1</td>
<td>Sick</td>
</tr>
<tr>
<td>Bifatu</td>
<td>2</td>
<td>Wild predator</td>
</tr>
<tr>
<td>Melka Hagar</td>
<td>3</td>
<td>Sick</td>
</tr>
<tr>
<td>Kulay</td>
<td>1</td>
<td>Sick</td>
</tr>
<tr>
<td>Kurale</td>
<td>5</td>
<td>Wild predator</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td><strong>14</strong></td>
<td></td>
</tr>
</tbody>
</table>

**Problems encountered**

- Lack of collaboration by the PA chairmen has been observed to affect the community participation during the vaccination work.
- Lack of understanding of the existence of different livestock vaccines by the pastoralists thinking that vaccination for one disease would protect for all diseases.
- Lack of pox vaccine from the National Veterinary Institute at Debre Zeit.
- Livestock dispersal towards the riversides and inaccessible parts of the district.

**Plan of action for March 2002**

- The vaccination work will be continuing till mid March 2002.
- Goat purchase will be accomplished using the cash collected during the project implementation for restocking of those poor HHs who have lost their livestock.
- Dry meat processing will continue in Melka Hagar area using the goats and will also be conducted using the camel and cattle.
- Final report preparation will be conducted as the project is going to phase out by March 31, 2002.

**General situation in Filtu District**

The existing situation in Filtu District can be shortly summarized as follows:

- Almost all the ponds dried up. Only Bifatu pond contain small amount of water during the writing of this report. Therefore livestock dispersed to the river banks.
- Livestock body condition is good except in Bandher and Kalajeh PAs, which did not receive the last Deyr rain.
- There were no major livestock diseases out breaks observed except for the respiratory problem in shoaats in Melka Hagar area.
- Livestock migrations have been reported from Afdher zone to Liben zone for better pasture availability.
Community-based Animal Health Services: Experience of Save the Children USA in Gode and Afder zones

Dr. Fesseha Meketa

SC USA in collaboration with LECDB has been implementing two CAHW projects in Dollo Bay and Dollo Ado woredas.

Project Title: Dollo Animal Health Project
Project Target Area: 1- Dollo-Ado District, Liben Zone in Region Five
2- Dollo-Bay District, Afder Zone, Region Five
Geographical Location: 1- Dollo-Ado borders Kenya (Mandera) and Somalia (Gedo region)
2. Dollo-Bay: Borders Somalia (Bokol Region)
Project Duration: Three years (October 1999 –December 2002)
Project Funding: USAID

Table 1. Livestock population

<table>
<thead>
<tr>
<th>Woreda</th>
<th>Cattle</th>
<th>Goats</th>
<th>Sheep</th>
<th>Camel</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>Dollo-Ado</td>
<td>159,944</td>
<td>436,099</td>
<td>380,030</td>
<td>201,322</td>
<td>1,177,395</td>
</tr>
<tr>
<td>Dollo-Bay</td>
<td>110,000</td>
<td>150,000</td>
<td>100,000</td>
<td>80,000</td>
<td>440,000</td>
</tr>
<tr>
<td>Total</td>
<td>269,944</td>
<td>586,099</td>
<td>480,030</td>
<td>281,322</td>
<td>1,617,395</td>
</tr>
</tbody>
</table>

Project Goals, Objectives and Core Activities

Goal: To develop an effective and sustainable model of self-supporting Veterinary service delivery for pastoralists in Ethiopia.

Objective 1: Education Services for Improved Animal Health

Objective 2: Provision of Curative and Preventive Animal Health Service

Objective 3: Establishment of Community Animal Health Workers’ Associations

Project Core Activities:
1. Training of Community Animal Health Workers (CAHWs)
2. Orientation of pastoralists on animal husbandry and livestock related activities
3. Promotion of private veterinary service delivery

Training of CAHWs

Methodology used:
- Selection of target group (trainees) for the training through discussion with community elders with clear understanding of commitment and expected results
- Given due attention to potential pastoralist members having livestock on their own that have animal health background
- Basic points used as selection criteria:
  1. Member of the community, residing in the community
  2. Good recognition and respected within the community
  3. Should be agreed by all clans of the area
4. Adult pastoralist member is preferred according to the local culture
5. The proposed nominee should be approved by District Office

Training Period:
- Basic training for 3 months with 2 weeks upgrading training
- The 3 months training comprises of 40% theoretical and 60% practical sessions.

**Status of CAHWs**

Training of CAHWs:
1. 21 CAHWs have got basic training for 3 months
2. 18 new CAHWs have received basic training for 3 months
3. 39 previously trained CAHWs received refresher training for 2 weeks

**Community Veterinary Awareness Raising Orientation**

SC US has organized and carried three sequential activities for livestock owners’ veterinary awareness raising and promotion of privatisation model. The three activities are:

1. 100 Livestock owners and 18 new CAHWs trainees have received 3 days workshop on current animal health problems and empowerment of private institutions to employ fee-for-service model. Following the elders’ veterinary privatisation awareness raising workshop; veterinary awareness raising sessions at the community sites was carried out through video show and general group discussions and 75,294 people participated in. The objective is increasing and improving the understanding of livestock owners’ animal husbandry and promote their animal health care participation through recently invented community based animal health care model. SC/US has sponsored tour visit training for 35 members comprises of 17 trained Community Animal Health Workers (CAHWs) and 18 livestock owners’ representatives from Dollo-Bay and Dollo-Ado woredas; the 35 members and SC/US Dollo Project staff member have visited different institutions which are directly and indirectly related to animal health care and animal products. The participants of tour training team has gained remarkable experience which has contributed observable change and narrowed the gap between livestock health workers and livestock raisers in the project impact area. The tour visit team visited: Awash Hide and Skin Factory, Vaccine Production Centre at Debrezeit National Vet. Institute, Addis-Ababa Diary Plant etc.

2. There is positive impact and it has facilitated better community understanding and community project implementation participation, I hope this will give chance lot of families to improve their livestock condition to maximize their benefits. Tour visit training and awareness raising activities have already alleviated the negative gap between livestock owners and animal health workers. The tour visit and awareness promotion have created observable positives changes which is the initial step to home of success More than 75,294 pastoral and agro-pastoral community members have participated in the veterinary awareness raising sessions at the community sites of Dollo-Bay and Dollo-Ado woredas of Afder and Liben zones respectively. The pastoral communities have shown unusual participation because the video show is new to them. The project has discovered that the 3 sequential awareness-raising activities are appropriate tool for pastoral communities education promotion.
   - Livestock owners have been paying the actual cost of vaccines from the 4th quarter of FY01.
   - Livestock owners learn the difference between the real and forgery vet drugs and buy the efficient drugs for their sick animals regardless their costs.
   - Livestock owners gradually understanding the difference between private and public livestock health service.
   - The livestock owners supervise the CAHWs performances and report regularly.
Provision of Livestock Preventive and Curative Services

Table 2. Livestock vaccination figures

<table>
<thead>
<tr>
<th>Woreda</th>
<th>Type of Livestock Vaccinated</th>
<th>Number of Livestock Heads</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Cattle</td>
<td>Shoats</td>
</tr>
<tr>
<td>Dollo-Ado</td>
<td>67,926</td>
<td>392,316</td>
</tr>
<tr>
<td>Dollo-Bay</td>
<td>63,459</td>
<td>288,246</td>
</tr>
<tr>
<td>Total</td>
<td>131,385</td>
<td>680,562</td>
</tr>
</tbody>
</table>

The previously and recently trained CAHWs have been the backbone of animal health preventive, curative and livestock owners’ awareness promotion. The total vaccinated livestock heads are 844,513 during the reporting period (October 1999 to March 2002). 600,695 heads out of total have received free of charge services while 243,818 heads of livestock have received partial vaccine cost recovery, which is paid by the livestock owners. The vaccination and treatment services reached part of Charati and Hargelle woredas of Afder Zone. The outreach teams have also served livestock immigrated from Somalia and Kenya. Unfortunately, the outreach teams were not able to report number of livestock heads received their services from the neighboring countries. The livestock owners show positive collaboration with the outreach animal health workers. The positive collaboration has been gradually increasing observable changes from the beginning of FY 01. The positive collaboration has narrowed the gap between the livestock owners and animal health workers in the project impact area and enhanced the livestock health care promotion.

Table 3. Livestock treatment figures

<table>
<thead>
<tr>
<th>Woreda</th>
<th>Species</th>
<th>Number of Livestock Heads Treated</th>
<th>Number of Male Animals Castrated</th>
</tr>
</thead>
<tbody>
<tr>
<td>Dollo-Ado</td>
<td>Shoats</td>
<td>22,760</td>
<td>1,568</td>
</tr>
<tr>
<td></td>
<td>Bovine</td>
<td>13,529</td>
<td>140</td>
</tr>
<tr>
<td></td>
<td>Camel</td>
<td>7,620</td>
<td>0</td>
</tr>
<tr>
<td></td>
<td>Equines</td>
<td>1,450</td>
<td>0</td>
</tr>
<tr>
<td></td>
<td>Sub-Total</td>
<td>45,359</td>
<td>1,708</td>
</tr>
<tr>
<td>Dollo-Bay</td>
<td>Shoats</td>
<td>14,159</td>
<td>516</td>
</tr>
<tr>
<td></td>
<td>Bovine</td>
<td>10,033</td>
<td>11</td>
</tr>
<tr>
<td></td>
<td>Camel</td>
<td>1,614</td>
<td>0</td>
</tr>
<tr>
<td></td>
<td>Equines</td>
<td>312</td>
<td>0</td>
</tr>
<tr>
<td></td>
<td>Sub-Total</td>
<td>26,118</td>
<td>527</td>
</tr>
<tr>
<td>Total for both woredas</td>
<td>71,477</td>
<td>2,235</td>
<td></td>
</tr>
</tbody>
</table>

The total treated livestock during the reporting period is 71,477 heads of livestock. Moreover, the vaccination/treatment teams have castrated more than 2,235 heads of livestock.

Livestock disease outbreak investigation and control:
- Shoat pox was observed at the most parties of Dollo-Ado wereda
- Anthrax outbreak was also seen in both woredas (Dollo-Ado and Dollo-Bay)
- Unidentified diseases outbreak was seen at Laboshilindi of Dollo-Bay wereda that killed lots of shoats.

Measures taken:
- Initial diseases investigations was done jointly by the Woreda LECDB and SC/US
- SC/US provided essential drugs and treatment teams with vaccination and the diseases is under control
- Dire Dawa Regional Laboratory investigation team carried out investigation of Laboshilindi livestock disease outbreak and took the necessary laboratory samples for further investigation and results not disclosed yet.

**Establishment of Community Animal Health Workers’ (CAHWs) Associations**

The animal health project initial plan was to establish two CAHWs cooperatives and process their legal registration. The Dollo-Ado CAHWs Association is being established and obtained legal registration from Region Five Agriculture Bureau during the FY00. Dollo Project office has developed policy and procedure of Dollo-Bay CAHWs Association and completed the process in December 2001 and obtained the registration certificate. SC/US has received two office rooms from Dollo-Ado wereda for the CAHWs Association. SC/US has renovated the rooms and furnished for them. Dollo-Bay wereda administration and its departments have no enough office rooms let alone providing office to the Association. SC/US has constructed 2 office rooms and furnished for Dollo-Bay Association. The two Associations are functional and have been the backbone of community based animal health services in the project impact area. The two Association members have made remarkable progress during the project live and obtained recognition from the community as well as the administration of their respective woredas.

**Supplies and Support of the Associations**

SC US has supplied vet drugs worth Birr 60,000 and vet equipment cost over Birr 100,000 to Dollo Project. All the trained CAHWs have received full set of vet equipment tool with leather bags and have access to livestock drugs. The vet equipment tools are consisting of all the essential vet equipment, which is free, but the drugs are revolving fund. SC US has also purchased 39 donkey carts with donkeys and tire maintenance tools cost Birr 117,000. Each of the 39 trained CAHWs has received one full set of donkey cart. The donkey carts are intended to use as a means of transport in the rural area as well as source of income for the CAHWs.

**Initiatives**
- Encourage establishment of CAHWs association
- Expand and promote private veterinary health service delivery through veterinary professionals
- Promote community based animal health service with the experience of CAHWs
- Encourage and support any existing associations livestock and income generation

**Long term Strategy**

SC US has long term strategy to upgrade the CAHWs through refresher trainings to Animal Health Technician level, in with relevant government offices.

**Potential Partners**

VOCCA-Ethiopia; GL-CRSP PARIMA; World Bank (with its Project on “pastoral Area Development in Ethiopia) ; Government of Ethiopia ; Livestock, Environment and Crop Dev’t Bureau of Somali Region further to District level; Other relevant Line Departments

**Problems Encountered**

- Frequent drought of the project area has worsened the existing livestock poor condition and high mobility of pastoralists in search of water and pasture
- Some of the livestock owners are reluctant paying their animal health services owing to lack of cash due to lack of livestock market.
- The frequent fluctuation of local currencies has confused the animal health service providers and livestock owner
- Lack of market for selling livestock collected in kind during the vaccination/treatment campaign.
Community-based Animal Health Services: Action Contre le Faim (ACF) Experience in Warder and Korahe zones
Dr. Bayou Abera

Since 1999 ACF started animal health and early warning projects in Warder and Korahe zones of the Somali National Regional State. But due to different constraint factors the implementation of animal health program is delayed. It is commenced in August 2001.

Non-existence of either public or private veterinary service in these two zones
Animal health professionals are unavailable in the zone; the livestock diseases are rampant in the region, taking into account the above constraints, ACF started implementing training of community based animal health workers.

Approach and activities

**Community dialogue:** at the out set of the program dialogue is carried out with the community members, the clan leaders and elders in the area to prioritize livestock disease, introduce the program. This activity is repeated several times to identify problems, strategy and action plans.

**Community meeting:** selected members of the society are called for a one-day meeting to discuss on the selection criteria and the participation of the community and about payment for the service.

**Outcomes of the meeting: selection criteria:**
- The candidate should be pastoralist
- Have knowledge on traditional treatment
- Honest to the community
- Respectful and respect the community
- Live around water points
- Owns livestock
- Have a family
- Fit to walk and matured (middle age)

In accordance with the above criteria the attendants return back to their place, aware the community members who do not get the chance to attend the meeting. They selected the trainees, report to ACF on the agreed date.

**CAHW training:** The training lasts twelve consecutive days. The training themes restraining methods anatomy and physiology of the different organs of the body of animal, clinical examination, the difference between healthy and unhealthy animal, route of drug administration, vaccination, infectious diseases, internal parasites, external parasites, about drug handling and dosage of drugs (antibiotics anthelmintics and acaricide application) and sterilization of equipments. At the end of the training CAHWs received basic veterinary equipments and drugs of antibiotics, anthelmintics, wound spray and acaricide seed capital.

**Supervision:** supervision conducted at the water points. Technical backup and correction of the technical problems faced on the water points. Informal discussion carried out with the users on the activity of the CAHWs. Supervision is monthly bases activity of the team.

**Reporting:** each CAHWs is given reporting format at the end of the training and obliged to report activities and out breaks of animal disease to ACF and DDOs every month.
**Drug source:** CAHWs received few amounts of drugs as initial seed capital. When they finished the drugs they should buy from locally available drug vendors. However, some important drugs (oxytetracycline long acting, wound spray antibiotics) are not available in the drug vendors shop and ACF had discussion with the drug suppliers to supply these drugs for CAHWs. The drugs in the kit are purchased from locally available drug shops.

**Refreshment training:** the refreshment training is planned to be four months after the first training and then every year.

**Achievements**

ACF has trained 35 community based animal health workers in four districts of Korahei zone of SNRS.

<table>
<thead>
<tr>
<th>Woreda</th>
<th>Number of CAHWs trained</th>
</tr>
</thead>
<tbody>
<tr>
<td>Kebridahar</td>
<td>13</td>
</tr>
<tr>
<td>Shekoish</td>
<td>9</td>
</tr>
<tr>
<td>Shilabo</td>
<td>8</td>
</tr>
<tr>
<td>Dobowoyeni</td>
<td>5</td>
</tr>
</tbody>
</table>

**Lessons Learned**

**Constraints**

New people visit the water points every time. CAHWs are introducing themselves to the new community everyday. The demand for free service is high and the wrong perception NGO trained the CAHWs so the drug they hold is for free. Some of the community members also considered CAHWs as employees of ACF. It indicates that still sensitization is big activity to be done in the coming periods until the development strategy is assimilated into the community.

The community knowledge on the use of vaccine is limited; the circulation of the Somalia foreign 500-shilling note is high. This causes the CAHWs not to give service because the community wants to pay for the CAHWs knowing that its value in other business is futile.

Lack of cash in hand - because of the livestock ban they are unable to sale small ruminants and get money to treat sick animals.

There is no legal licensed veterinary pharmacy.

**Positive**

The service is expanded to the needy people at the remote areas.

Improving the wrong tradition of the trainees and the community on modern drug dosage especially on oxytetracycline and anthelmintics (above 10ml and more than half bolus kill animals). Which reduced the future drug resistance problem in the area.

The willingness of the community to pay for the service is improved; some of the CAHWs received kind payment shoats.
The good understanding of men about the participation of the women in the meeting and consented on the possibility for the training of women CAHWs in towns and settlements areas in the forthcoming program.

Conclusions

The community based animal health workers are very important veterinary service providers in marginalized area like korahei zone where public or private veterinary services are non-existence. Sensitization of the community and close supervision is required until it is established very well on the grass root level.

The Veterinary Services Support Project of Save the Children UK

Dr. Gedlu Mekonnen

The highlight presentation on the veterinary privatisation support project of SCF UK indicted the project period to be up to October 2002. Achievements during the period included two regional policies on privatisation issued and 10 veterinary pharmacies established through 335,000 Ethiopian Birr credit offered. High turn over rate of regional governments officials and lack of clear privatisation policy at federal level were under lined to hamper the efficiency of the program in terms of lag behind the target set initially. Additional 6 pharmacies and capacity building support to the LECDB will be immediate areas of focus during the remaining project period.
Location of CAHW programs in the SNRS

A mapping and analysis exercise was conducted with CAHW project implementers to know the areas covered by those NGOs that did not appear in the workshop. The pins put on the map of the region has shown that the CAHW projects are fairly distributed with slightest overlap at wereda level. Also there are areas, which have not been addressed and to be considered in the future. The mapping exercise result is presented as follows:
4. Supplementary presentations

The Pastoral Extension System in Ethiopia

*Dr. Edmie Alem, MoA Pastoral Extension Department*

In the lowlands of Ethiopia, pastoralism is the mode of production best suited to an arid and unstable environment. Livestock sector development has the potential to improve the welfare of many poor rural families, as well as contribute significantly to national income. Population pressure and the increasing frequency of droughts however, exceeded the ability of traditional strategies to cope, resulting in widespread animal deaths, food insecurity and conflict.

The solution to poverty in pastoral areas is not simply a matter of increasing livestock production – pastoral households also suffer from poor access to social and economic services. In the past, pastoralist area development has received little attention from policy makers, and pastoral peoples continue to be marginalized economically, socially, and politically. The severity of their plight in recent years however has prompted new interest on the part of the Government of Ethiopia (GOE) and its development partners to search for solutions. The purpose of this paper is to stimulate discussion on development options for pastoral areas.

The pastoral communities of Ethiopia inhabit 61% of the land and they constitute about 12 % of the total population. The areas they inhabit are arid and semi arid, with an elevation of below 1500 meters. In general the country is divided into five areas namely, North eastern; Eastern; Southern; Southwest and western parts of the country and there are around 7 million people and the 26% of national livestock population is hosted in these part of the country. In general pastoral areas are known for the huge natural resources, such as medicinal plants, tourist attractive animals thus almost all national parks are found in these parts, minerals and geothermal powers.

On the other hand pastoral areas are full of life-challenging factors to people including malaria, water borne diseases and several animal health constraints. The ecology also is highly fragile to be characterised by high soil salinity, low precipitation, high water evaporation rate and erratic rainfall.

The national pastoral extension system is operating based on the ADLI policy that foreign currency and industrial production promotion via awareness creation on natural resource efficient conservation and utilisation extension works have given due attentions. To bring food self-sufficiency and improve household level livelihood through improve livestock production productivity has formed the immediate objectives of the pastoral extension program. Introduction of new technologies and credit to the community with good involvement of women also is part of the major objectives. In general livestock and water development programs do form major areas of intervention under the pastoral extension program.

**Approach towards implementation**

Mobile extension service will be sectoral and integrated to incorporate livestock, crop and natural resources.

Holistic development program - agriculture, health, water, education, etc.

In this approach, traditional social organisations, clan structures and government PAs will form the basis for the implementation of the ADLI strategy in pastoral areas to serve as entry points.
**Pilot program**

The pilot program is intended for selected areas of Afar and Somali national regional states. As a result Asayta wereda has been taken from Afar and the package initiated is composed of animal health, water and forage development services. The animal health component involves training of CAHWs who will serve as the main agents to disseminate technologies to the community. The program has not yet initiated in SNRS. As MOA cannot command its regional partners it will focus on guideline development and training of local staff to build the capacity of regional governments to take the responsibility.

**The Necessity of Emergency Preparedness and its Major Principles**

*Dr. Solomon Tibebu, PACE Emergency Preparedness Unit*

**Stages of rinderpest eradication in Ethiopia**
- Declaration of provisional freedom from RP on a countrywide basis and withdrawal of vaccination
- Declaration of freedom from disease (RP) at national level
- Declaration of freedom from infection of Rinderpest virus

**Rinderpest situation in Ethiopia**
- No vaccination all over the country
- Susceptible population is increasing
- RP is becoming an old history (Nov. 1995)
- RP situation in the neighbouring countries
- Recent outbreaks in Somalia and Kenya
- Civil unrest and draught in Somalia
- Uncontrolled animal movement in and out of the border

**The existing situation**
- Sanitary cordon is not 100% efficient
- Decreased awareness
- Absence of integrated effort between neighbouring countries results in:
  - Poor information exchange
  - No risk assessment
  - Absence of veterinary legislation
  - Absence of EMERGENCY PLAN

**The dangers of re-introduction**
- High mortality (high susceptible population)
- Decreased food security, Social and economic effects
- Requires mass immunisation programme
- Back step from the OIE pathway & GREP schedule
- Export limitation

**Therefore the necessity of emergency preparedness has arisen to:**
- Principles of animal disease emergency preparedness
- Early warning of diseases
- The success of early warning system depends on:
  - Early reaction to disease out breaks.
The role of CAHWs in emergency preparedness

- Pastoral area of Ethiopia covers a total area of 60% of the country
- The most part of the surveillance zone falls in this area
- The conventional vet. Service delivery poorly covers the area
- By default the alternative AHD would be the use of CAHWs
- CAHWs are the first line of defence in the control of animal diseases in the pastoral environment

Role of CAHWs in early warning

- Contribute to the rapid detection of RP & other TAD introduction
- Awareness creation for livestock owners
- For disease surveillance and monitoring

Role of CAHWs in early reaction

- As potential manpower resource in time of emergency in their area of operation
- CAHWs can sustain the system delivery of the service they are giving by establishing linkage with the drug distribution system.

What has been done?

**Early warning**

- Training to veterinary Professionals & sub professionals
- (Communication, Epidemiology, Emergency preparedness)
- Training of Farmers (communication unit)
- Disease surveillance (passive, active)
- Reporting rate increased

**Early reaction**

- Second draft of NREP prepared (?)
- NRET established (?)
- Draft TOR for NRET & RRTF prepared
- PAN/VAC certified vaccine available
- Emergency fund allocated (insufficient)
- Resources (Vaccine Cold chain, camping equip. Vehicle) available
- Disease control centres PARC/PACE-BCOs ready to react for emergency
- NAHRC can be used as diagnostic laboratory

What should be done?

- Follow the OIE path way to Achieve “Freedom from Infection”
- Establish a sustainable system to maintain what has been achieved HOW?

GET PREPARED FOR THE WORST
Realise EARLY WARNING AND EARLY REACTION CAPABILITIES
NATIONAL EMERGENCY PREPAREDNESS PLAN

Points of attention on early warning

- Farmers awareness (Radio message, community meeting and dialogue)
- Training on clinical and gross pathological recognition of RP
- Active disease surveillance including serology and abattoir monitoring
- Risk assessment
- Establishment of Emergency reporting mechanism
- Enhancement of laboratory diagnostic capabilities for priority diseases
Points of attention on early reaction

- Establishment of National Animal Disease Emergency Committee (NADEC)
- Contingency planning both generic for specific diseases should be established, tested, fund availability assured
- Diagnostic preparedness capacity should be in place for all high-risk diseases
- Epidemic livestock diseases included in the national disaster plan
- Legislative and administrative framework prepared
- Veterinary services restructured
- We have to strengthen our surveillance;
- Create enabling environment and build capacity for swift application of early reaction to respond for urgent calls and swift application.

Conclusion
The stage of development we have reached in the process eradication of Rinderpest has taken us much TIME, ENERGY and MONEY. Thus we should be able to safeguard the achievements gained so far and strictly follow the GREP blue print to get rid of the disease (declare Freedom from Infection) by the year 2006
To guarantee all these consecutive developments, we need to have reliable and tested emergency preparedness plan in place.
5. Discussion of presentations

A discussion period was held following the presentations on the CAHWs in the region and the summary of comments and questions entertained are as next presented.

Comments

The Head of DPPB Ato Muktar denied the fact NGOs mentioned that the zone departments have remained weak not to support their efforts as required nor co-ordinate them in the past. He said we believe we have been together but if they say the zones are weak, it means we were not together.

Questions

Puntland PACE co-ordinator
1. As we are preparing CAHW projects it benefits us if the experiences in the area of project formulation steps and exit strategies would be further elaborated. How long does it take to initiate the implementation once the planning work is done?
2. How do the NGOs select target areas for their CAHW projects, is there a system where overlapping and duplication of work could be avoided?
3. Who selects CAHWs and how many rounds of supply do the CAHWs receive subsidised drugs?

PACE Somalia team member:
It seems that there is no linkage among the NGOs and also there is a high risk of lack of sustainability under this condition. Therefore how can we appreciate successes reported, what are the indicators considered measuring the positive achievements indicated?

Dr. Edmealem Shitaye (MOA Pastoral Extension Team)
1. Have you ever cited the impact of CAHWs system so far operating in the SNRS?
2. What sort of relationships do the NGOs involved in to the CAHW service delivery system has among themselves.
3. What is the role of concerned government departments in the CAHWs monitoring evaluation process and how is the follow up system.

Dr. Abdullahi (Head of Livestock Department, SNRS)
Some vaccines are not allowed to be done without the knowledge of the concerned government bodies but some NGOs are reporting PPR and FMD vaccinations. What is the reference regulation for NGOs in this line?

PACE Somalia (team member)
CAHWs are said pastoralists who travel with animals in that case how do the NGOs monitor their service.

Dr. Rudi (LVIA)
There has been no drug subsidising practice at all rather the initial kits have been provided as start up stock to the new graduate CAHWs. The CAHWs have then channelled to the private drug shop in Moyale town within 6-month period. The community does selection but wereda staffs supervise the process. The impact assessment work has now initiated after 5 years implementation program.
Dr. Fesseha (SC USA)
Projects preparation starts from the grass root level through consulting beneficiary community to then goes up to wereda, zone and region line departments in order to have the project signed. The steps involve need assessment by the NGO and line departments, concept note to Donors to request fund to prepare project and project planning process based on response from the Donor side (add on from LVIA).

Ato Abdi (PCAE)
The community sets the selection criteria and it is the community who selects CAHWs. It is true co-ordination among NGOs is very important and there has been some interactions among ourselves. For example the southern pastoral area based NGOs, PCAE, LVIA and SC USA have regular meetings among themselves to discuss their progresses and problems. There is also a national level forum on pastoral area development programs, which addresses livestock health issues as well.

Dr. Bayou (ACF)
CAHW systems could be handed over partly to the community but the government would take the supervision part at least. How the system will continue I think that is why the workshop has held and it will be discussed from now on ward.

Dr. Berhanu (CAPE)
Underlined the fact the workshop was not intended to conduct evaluation on NGOs CAHW systems and then comment on rather to learn what went well and also identify gaps to be filled through the discussions and final recommendations which should be resulted from this forum now on going.

Dr. Tariku (PACE Ethiopia Consultant)
The CAHW system has been on going for the last 25 years to have been filling gaps existing in the area of veterinary extension strategy. Therefore it is up to us the government person to develop guidelines and supervise it in fact now we have developed guideline on the training part. Truly speaking the NGOs are fairly distributed and have done nicely it is the government side which did not perform well in following the on going dynamics.

Dr. Fesseha (SC USA)
Supplemented by saying the government service ended failure, CAHW system has been taken as option and the community appreciated it. The question therefore is how to maintain it and for net working. At that point the head of region DPPB, Ato Muktar mentioned that there are NGOs who are not in this workshop.
6. Harmonisation of CAHW activities and information sharing

Dr. Berhanu Admassu

Working group sessions and presentations

Workshop participants were divided into 4 groups to discuss the following tasks:

Task one
- How to harmonize the activities of NGOs involved in CAH programs?
- The need to establish a network regarding disease surveillance and in general animal health information.
- To propose the best model for disease reporting and identify the possible constrains, and solutions.

Task two
1. To identify the type of information required and how this type of information should be collected and passed (Method) and identify indicators for the monitoring of the system.

Four participants were selected as group leaders as follows:
Dr Edmealem Shitaye for Group One
Dr Tariku Sintaro for Group Two
Dr Fiseha Meketa for Group Three
Dr Manuel Ferri for Group Four

Presentations by Working Groups

Group One

The kind of report differs. Emergency report in case of list A disease outbreak must go directly to MoA, by passing all the stages. Then there is the ordinary report (monthly base) on treatment, vaccination, ...

Information can be passed by fax, radio, mail. Where there is no means we have to bring OIE to the field.

Indicators: performance of the reports.

Diagram (model) on the information flow:

From CAHW to DDO and NGO, then to the Zone, Region and Federal. NGO can report directly to Federal.

Adds from other participant

Harmonization: there should be common understanding between DDO and NGO, and work together.

Constraints:
1. Lack of infrastructure and logistics
2. Lack of trained personnel
3. Frequent turn over of the staff
4. Unwillingness of the CAHW to report

Solution:
1. Clear and written ToR for every stakeholders
2. Awareness on these ToR
3. Looking for funds
4. Capacity building
Group Two

This group considered Task Two first and started by discussing the type of information as follows:

Primary and compulsory information, which is part of the training. CAHW have to report information on outbreak and on vaccination and treatment.

Secondary and not compulsory information on animal migration and EW.

Incentives can be after the training such as certificate and the reconnaissance from the community. Later on, refreshment courses, and then drugs and equipment. Report is a duty!

Pilot idea:
CAHWs report to NGO ➔ NGO reports to Zone ➔ Federal (2), DDO, Wereda, Region (6 copies).
The format is already available at Ministry of Agriculture.

Constraints:
1. Bypassing government structure
2. Availability of the formats
3. Lack of communication facilities
4. Lack of skilled personnel at Wereda level

Indicators:
1. Reporting rate/frequency
2. Quality/sensitiveness of the format delivered

A standard format should be prepared by PACE/CAPE if everybody agrees.

Group Three

The proposed reporting model:

Owners ➔ CAHWs ➔ NGO ➔ Federal MOA

DDO ➔ ZONE ➔ REGION

The model shows that the source of disease information will be the owner of the infected animals, then to the CAHWs. Then the CAHW can pass the information to NGO veterinarian, and the NGO directly to federal MoA epidemiology unit. Alternatively information can pass from CAHW to Wereda DDO, which can pass to Zone and Region at the same time and then to federal government. Then surely Region should anyway communicate to federal.

If it is possible the format should include not only the drug used but also the kind of disease treated.

Constraints:
1. Sustainability (phase out of the NGOs)
2. Non functionality of agricultural line departments
3. Lack of communication means
4. Limitation of the resources

Solutions
1. Capacity building
2. Build up communication structures
3. Rational budget allocation (train manpower)
Type of information:
1. Disease outbreak based on major clinical signs
2. Vaccination coverage
3. Livestock migration
4. Movement pattern
5. Disaster

Information transfer: through radio, mail, telephone, oral, written

Indicators:
1. Number of reports
2. Measures taken timely (visits, samples collected, tested, responses)
3. Availability of standardised format
4. Linkage of the different stakeholders

Dr Solomon Tibebu adds that the reporting from the Wereda level up to MoA is already on the ground with the format of OIE.

**Group Four**

The model is the same as Group One but only dot line the link of NGO who are supposed to be present only where the government is not there. Information is collected by community elders, livestock owners, at water points, and given to the CAHW, who is supposed to report on written form to wereda, and wereda to region and to MoA epidemiology unit at the same time. NGO can only facilitate whenever they are present in the absence of the government structure.

Constraints:
1. Lack of linkage between CAHW and Wereda
2. Lack of willingness of the CAHW to report (and economic problem)
3. Remoteness of the area

Recommendations:
1. Involve DDO (or MoA line department) in the training, since the personal knowledge can facilitate the communication.
2. Insert the reporting as important topic of the training
3. Agric LDs collect report directly from the community
4. Everybody can bring the report from the CAHW to the DDO
5. Vet Pharmacies can collect the report when the CAHW go to purchase drugs

Other problem (at MoA level):
1. Absence of vehicle and perdiem
2. Poor linkage of wereda to zone
3. Lack of accountability of the wereda to MoA
4. Lack of professionals

Solutions
1. Provision of means of transportation
2. Capacity building
3. Strength the linkage of wereda to zone
4. Establish of visible structure
5. Attract more professionals with better salary, or with the chance to have a private business
6. Set up of technical units for diseases

Type of report must be:
1. Easy to compile and to read.
2. Standardized
3. Pictorial, with docks, local languages
Indicators:
1. Number of reports
2. Follow up of the reports
3. Time taken

Discussions on the working group presentations

Dr Fiseha Meketa comments on Group Four presentations, particularly the broken line arrow if it means that it is not mandatory to report?

The group respond that it is because the NGO may not be always be there. As the same time it may not be in also in the agreement with the donor policy, since they want the government to be build capacity and take this responsibility. However the government veterinary service is not in place in most of the remote weredas and unable to gather or collect disease information for the country as well as for the international societies. In this case the role of NGOs is very high and should take the responsibility as transitory solution, but not to replace the government forever. That is why the relation was shown as broken line.

Chairman raise the point that all the groups present a one way flow, but it is needed that the direction from the center to the origin of the information should be taken into account. The information should be two ways.

Another point of discussion was the particular case of the Somali Region, where the wereda veterinary structure is not strong. It was mentioned that the problem is also after the wereda. If CAHWs are initiated the report will reach to the wereda DDO, but later it will stops at wereda level. This is because there is no direct link or accountability from the wereda animal health service to the regional or zonal LECDB animal health department. The problem is again wereda DDO, which is only accountable to the regional administration (council). So the question is what to do after the wereda level. In this case the role of NGO to send the report to the federal veterinary epidemiology unit is a paramount exercise.

It is said that all models proposed by 4 groups are relying on the government system, which is actually hypothetical and not working at the moment. The system presented implies that NGO should stay forever; instead we have to focus on building the capacity of the government structures.

The Chairman clarifies that if the government reporting structure was working and functional there was no need for all of the workshop participants to be here. However Dr Abebe from LECDB says that he is very sorry to hear that Somali region is marked as a out of order region, and list what is there and working in the Somali region. He said also SERP did a lot and is still functioning, all the information are available. He does not agree with the idea that zonal level should be skipped.

Dr Gezu repeats that our objective is to design a functional system for reporting animal health activities and Dr Fiseha (SC USA) feels a misunderstanding about the issue and the situation. We are now on the emergency situation in regards rinderpest and epizootic diseases but at the same time we need to leave something working, therefore we need to work closely with DDO and with the community.

Dr Sintayehu from NAHRC has clarified that information is good when it is on time; therefore we need to have the information as soon as possible. So we need an obvious flow according to the government structure (Wereda-Zone-Region-MoA), but at the same time an efficient way directly from Wereda to MoA. Now the problem is how to solve the problem at Wereda level.

Dr Derebie from HCS recognizes that when SERP was working disease reporting was being exercised even though was not strong enough, but now SERP is no more there, and DDO is not doing the work. In Shinille experience the wereda administration is the one working in the field but not the animal health, and again you
should not forget that wereda administration is accountable to Zonal or regional administration in situation where you could not get any report at all.

Abdi Deer from PCAE makes clear that the structure for pastoral administration is the copy set up with the highland mentality, and we are here to try to set up a structure that can fit with the pastoralist’s mentality. We have to agree with the model proposed for the time being, for a year and then maybe all structure of the government will be changed. Let us keep now one of the structures proposed then. He suggests the Group Three structure.

Dr Abdullai Hussein, the regional animal health department head finally resumed the history of SERP. He said SERP was not working in Liben and Shinille Zone. Again now LECDB and SERP are put together, but still the problem of DDO has not been solved. DDO has not clear accountability, and surely not to LECDB. That is why there is no flow of information. For the time being the presence of NGOs can help in filling the gap of the not accountability of DDO. Therefore the assistance of NGOs to collect disease information and to disseminate it to different organizational level is the only alternative we have if we are thinking and requiring disease information. Therefore he proposed to shorten the discussion by accepting the proposed model by group three.

Finally all workshop participants after modifying the proposed models accepted the following disease reporting model to be used by all respected stakeholders as of the next physical year.

Community-based disease reporting model for Ethiopia as proposed by the Jijiga workshop participants
Group discussion on the roles and responsibilities of different types of animal health service provider

This session was mainly a group discussion to define the roles of the different actors in the animal health service delivery system (Government, NGOs, Private and CAHWs).

The following are the summary of group discussions:

Duties and responsibilities of CAHWs in animal health service provision

Under the supervision of a registered veterinarian and registered AHA or AHT:
- Diagnosis and treatment of common and locality specific diseases;
- Provide advice on and perform routine minor surgical procedures including: wound treatment, bloodless castration, dehorning, and hoof trimming;
- Dispense veterinary drugs in the course of providing clinical services to livestock owners;
- Provide ad hoc reports on suspected disease outbreaks to the wereda veterinary authorities;
- Maintain and provide accurate records on routine animal health service activities in written or pictorial forms;

Duties and responsibilities of Private Veterinarians in animal health service provision

- Delivery of all clinical services and private good vaccinations;
- Wholesaling and retailing of veterinary supplies – drugs, equipment, etc.;
- Reporting of notifiable diseases to government veterinary services;
- On-the-job training of Para-veterinary professionals and CAHW;
- Supervision and monitoring of private veterinary-veterinary and CAHWs;
- Ensure compliance of the regulations pertaining to all veterinary services;
- Perform state functions under contract:
- Vaccination,
- Meat inspection
- Inspection of animals for movement or export prior to government certification
- Collaborate with government in all matters pertaining to the livestock sector

Duties and responsibilities of government veterinarians

At the Federal level – MoA Animal Health Service
- Formulation of national policies governing the development of the livestock sector
- Advise on implementation of livestock development policies
- Formulate, review, revise and enforce laws and regulations pertaining to animal health and the delivery of Animal Health Services
- Monitor and regulate standards of practice in the Livestock sector in relation to:
  - Veterinary pharmaceuticals
  - Livestock input supply chain,
  - Reporting system,
  - Service delivery
- Prevention, control, surveillance and monitoring of major trans-boundary diseases (List A diseases.) and diseases of national importance
- Imposition and supervision of quarantine measures
• National, regional and international liaison on livestock and zoonotic disease control and other animal health matters (MOH, OAU/IBAR, OIE, FAO, etc.) Create and sustain an enabling environment for the private sector to operate and to contribute to the delivery of Animal Health Services.
• Maintain database of occurrences of diseases of national importance, and livestock census.
• Contribute to the review and revision of professional and Para-professional veterinary curricula.

Shared responsibilities of Public and Private Veterinarians at the national level

• Preserve and protect the interests of the Veterinary profession, public and private sector
• Regulate the professional and Para-professional delivery of animal health services.
  ▪ Ethiopian Veterinary Association
  ▪ Ethiopian Animal Health Assistants Association
  ▪ Ethiopian Animal Health technicians Association

At the Regional level

• Advisory, regulatory, monitoring of livestock issues between federal and regional government
• Communication of policy issues between central government and the wereda levels.

At Woreda level

• Data collection, management and reporting of notifiable diseases and diseases of national importance;
• Management of meat inspection and food products of animal origin;
• Prevention, control, surveillance and monitoring of major transboundary diseases (rinderpest, CBPP, FMD, PPR, etc.) and diseases of national importance;
• Management of vaccination of outbreaks of notifiable diseases;
• In the absence of private vet supervise private Para-veterinary service providers;
• Monitor and regulation of public Para-veterinary professionals;
• Inspection and certification of animal health for the purpose of issuance of movement permits;
• Inspection of livestock markets;
• Training of CAHW, and facilitating the development of private animal health service delivery systems.
7. Workshop Recommendations

Noting the importance of livestock for the pastoralists at the household level.

Recognising the role of livestock for the regional and national economy

Considering:

- The widespread of animal diseases in the Somali regional state
- Appreciating the achievement and success in the eradication of Rinderpest and the current progress in the OIE pathway
- The long border with neighbouring countries where there is suspicion of rinderpest foci (mild rinderpest) and the uncontrolled movement of animals across the border that can be a possible means of rinderpest re-incursion to Ethiopia
- The low level of animal health services delivery system in the region

We the representatives of,
Regional Livestock Environment Crop Development Bureau
Regional Disaster Prevention and Preparedness Bureau
Zonal Livestock Environment Crop Development Bureau
Woreda Livestock Environment Crop Development Bureau
PACE MoA
Pastoral extension department of MoA
National Animal Health Research Centre
Faculty of Veterinary Medicine
Dire Dawa Regional Laboratory
Harar PCE Branch Coordination Office
NGOs from HCS, SC (UK), SC (USA), CCM, PCAE, COOPI, LVIA, ACF
Private veterinary practitioners

After 3 days deliberations on the above issues recommend:

1. The strengthening of public veterinary services of the region by:
   1.1. Improving the existing veterinary services structure;
   1.2. Developing manpower; allocating sufficient budget and logistics; and improving infrastructures;

2. The improvement of animal health information (AHI) exchange from district through zone and region to the Federal Veterinary Services;
3. The safeguarding of the achievements gained so far in rinderpest eradication through strengthening of active disease surveillance involving all stakeholders;

4. The recognition and continuous support of CAHWs and NGOs engaged in animal health related activities;

5. The participation of NGOs in regular livestock disease occurrences-reporting in their operational areas as well as their involvement and strengthening of Livestock Early Warning System (LEWS);

6. The promotion and support of private veterinary practitioners and CAHWs, as well as creating linkage between them;

7. The Federal Veterinary Services (MoA), the higher learning institutions, veterinary laboratories and research organisations to take the problems of animal health in the pastoralists areas as their priority agenda in their development, teaching and research endeavours;

8. Finally, we here underline that there is a need for continuous initiation of OAU/IBAR CAPE Unit in supporting, harmonisation and active involvement is very paramount in materialising the above-enumerated recommendations.
Annexes

Annex 1. Workshop timetable

DAY ONE
Tuesday, 26th March 2002

Morning Session
08:30 - 09:00  Registration
09:00 - 09:30  Organizers welcome address and presentation of the workshop objective and agenda
09:30 - 09:45  Introduction of participants
09:45 - 10:00  Workshop opening speech
10:00 - 10:30  Coffee Break
10:30 - 11:00  An overview of the delivery of animal health services in Somali regional state
11:00 - 12:00  Community-based Animal Health Programmes: The benefits of professional vets participation, Opportunities of a CAH service delivery
12:00 - 12:30  Questions and Discussion
12:30 - 02:30  Lunch Break

Afternoon Session
02:30 - 4:00  The provision of animal health services by community-based animal health workers
04:00 - 04:30  Coffee Break
04:30 - 05:00  Veterinary privatisation in Somali regional state, the experience of SC(UK)
05:00 - 06:00  Mapping Exercise

DAY TWO
Wednesday, 27th March 2002

Morning Session
08:30 - 9:00  Pastoral extension system
09:00 - 10:00  Rinderpest situation and control/eradication strategies and the role of CAHWs in disease surveillance programme
10:00 - 10:30  Coffee Break
10:30 - 11:30  The role of CAH projects towards emergency preparedness in the control/eradication of rinderpest
11:30 - 12:30  Questions and Discussion
12:30 - 02:30  Lunch break

Afternoon Session
02:30 - 4:00  Harmonization of community-based animal health activities and information sharing (brain storming)
04:00 - 04:30  Coffee Break
04:30 - 05:00  Group discussion based on brain storming
05:00 - 06:00  Plenary: reporting of suggested coordination options

DAY THREE

Thursday, 28th March 2002

Morning Session
08:30 - 10:00  Roles and responsibilities of different types of animal health service providers (Group work)
10:00 - 10:30  Coffee Break
10:30 - 11:30  Group work continued
12:30 - 02:30  Lunch break

Afternoon Session
02:30 - 4:00  Presentation of group findings and discussion
04:00 - 04:30  Coffee Break
04:30 - 05:30  Recommendations and way forward
05:30 - 06:00  Closing of the workshop
## Annex 2. List of participants

<table>
<thead>
<tr>
<th>Name</th>
<th>Organization</th>
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<tbody>
<tr>
<td>Abdi Abdulahi</td>
<td>PCAE Filtu</td>
<td>Addis Ababa</td>
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<tr>
<td>Abdi Edris</td>
<td>SC(UK)</td>
<td>Jijiga</td>
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<td>Abdullahi Hussien Woyrah</td>
<td>Animal Production and Marketing</td>
<td>Jijiga (LECDB)</td>
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<td>Abdullahi Hussien Yusuf</td>
<td>Animal Health Department</td>
<td>Jijiga (LECDB)</td>
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<td>Abdurahman Ahmed Gata</td>
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<td>Fiq</td>
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<td>Abebe G/Silasie</td>
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<td>Abebe Wosene</td>
<td>FVM, AAU</td>
<td>Debrezeit</td>
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<td>Ahmed Idid Mahamoud</td>
<td>Jijiga (LECDB)</td>
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<td>Ahmed Shek Aden</td>
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