

# IMPACT ASSESSMENT REPORT



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## **ACRONYMS AND ABBREVIATIONS**

**BSP** Bongo Surveillance Project

**BST** Bongo Surveillance Team

**GEF** Global Environmental Facility

**GPS** Geographic Positioning System

ILRI International Livestock Research Institute

**KFS** Kenya Forest Service

**KWS** Kenya Wildlife Service

NMK National Museums of Kenya

**RA** Rhino Ark

**SGP** Small Grants Programme

**TOR** Terms of Reference

**UNDP** United Nations Development Programme

## **EXECUTIVE SUMMARY**

## (i) Background

The Mountain Bongo antelope (*Boocercus eurycerus Isaaci*) is a rare species that by the 1990's was thought to be wiped out in Kenya. The Bongo Surveillance Programme (BSP) is a community driven conservation initiative that was established in 2004 to protect and investigate the status of the remaining wild Bongo. Among its core activities are:

- Maintain core surveillance of the Aberdares ecosystem
- Broaden the area surveyed, including comprehensive coverage of Mt. Kenya, the Mau Forest and the Cherengani Hills
- Engage local communities adjacent to known bongo populations to continuously monitor their local herds
- Purchase, install and maintain a network of animal triggered camera-traps, which enable population sizes to be estimated through individual photo-identification

The Rhino Ark Charitable Trust is engaged in supporting conservation of the Aberdare Ecosystem. Key activities carried out by Rhino Ark include:

- Fund raising for the construction and maintenance of the Aberdare electric fence, a critical management tool
- Supporting conservation initiatives among the local Aberdare communities, including wildlife conservation and tree planting
- Fostering constructive engagement between various stakeholders in developing holistic approaches to ecosystem conservation in the Aberdare ecosystem

Rhino Ark provides key operational support and funding to the Bongo Surveillance Programme.

#### (ii) UNDP GEF/SGP Grant

In 2007, Rhino Ark applied to UNDP for a grant to support the operations of the Bongo Surveillance Programme (BSP). UNDP, through the Small Grants Programme provided a US \$ 50,000 grant to support the continued operations of the BSP for a period of 2 years, from September 2007 to September 2009. Disbursements under the Grant were divided into three (3) Tranches. The activities for Tranche 1 were successfully completed in the period from October 2007 to April 2008, following which Tranche 2 was disbursed. The activities under Tranche 2 commenced in May 2008, running through to April 2009. Tranche 3 activities commenced in May 2009; with the bulk of activities having been completed by November 2009.

## (iii) Assessment process

The assessment of the BSP activities covered the period from year 2007 to 2009 and involved the following:

- Inception brief by Rhino Ark through the Resource Development Manager
- Review of project documentation
- Field visits to project areas
- Oral interviews with the Rhino Ark Resource Development Manager, core BSP team, trackers, Research scientist from Rhino Ark, KWS personnel, Patrons of Bongo Wildlife clubs, community representatives, and pupils who are members of Bongo Wildlife Clubs
- Field observations
- Photography

## (iv) Overview of findings and recommendations

Through the evaluation process, it was noted that the Bongo conservation initiatives have contributed significantly to conservation, including awareness creation and logistical as well as other support contributed to the project including coordination and financial aspects. The Bongo Surveillance Team (BST) was at the core of the programme implementation and had a significant contribution to its success through the ground and air surveillance activities. The School Wildlife Clubs/Bongo Wildlife Clubs were core entry points to the community which enhanced the project acceptance to the local communities bordering parks and forests in Aberdares and Mt. Kenya areas. This was evident by the high community support accorded to the project i.e. through volunteering information as well as stoppage of illegal activities in the above named project areas as collaborators and informers.

The project acquired equipment for the surveillance activities but they were not adequate. These included trap cameras, GPS, digital cameras as evidence gathering tools among others. A proper operational base for the BSP team was found to be lacking for use when not in the field. Information flow and reaction time between the BSP team and KWS was found to have been slow hence there is a need for enhanced cooperation between all partners with the Rhino Ark being the coordinator of all the project activities including being a link between project partners i.e. KWS, Research teams, the community and all other stakeholders because of its managerial capacity.

Publicity materials; specifically large format posters and brochures were produced which had a high impact to the community in creating awareness. These included fliers, pamphlets and other reading materials which were even displayed in market centers, pubs where poachers were known to frequent which led also to a change in attitude towards Bongo and wildlife conservation. The school clubs patrons were found to have inadequate knowledge on conservation as evidenced by their request to be trained on the same

In the area of project accounting and utilization of resources, it was noted that the resources were grossly inadequate for overall running of the project. This was evidenced by over expenditure in several instances as well as intermittent periods of activity during the grant period which affected ground and air surveillance and most importantly scientific research because these activities needs linkage and should work concurrently and continuously.

#### (v) Key Recommendations

- 1. It is recommended that there should be enhanced and continued future funding for the project so that the BSP can continue with its critical activities of conserving the critically endangered Bongo for the benefit of present and future generations.
- 2. The school Bongo Clubs activities should be expanded to other schools.
- 3. A survey needs to be done to determine new and willing schools within regions of Mt. Kenya and Aberdares to participate in the project including high schools to create awareness since illegal activities in the above named areas may in present or in future have been or may be caused by persons outside the present area of coverage for the project.
- 4. In order to enhance the BSP present activities, multiple sources of funding for other synergy projects like energy saving technology, fish farming et al should be explored and training done to beneficiaries for sustainability. This shall enable enhancement of project impacts.
- 5. In order to collect more reliable data and information, there is a need to conduct surveillance activities within a schedule so that information and data gathering becomes regular. This should be done concurrently with scientific data collection and analysis. Towards this aspect of the project, enhanced and multiple sources of funding are necessary to provide sufficient resources to support the BSP teams. A collaborative framework should be developed between all partners to enhance resource sharing and information dissemination.
- 6. Financial accounting to development partners and UNDP should take cognizance of different field conditions and proper accounting mechanisms should be put into place for reporting and accounting for funds utilized by grantees with an approved format.
- 7. Overall, further project funding by development partners, Government and other partners is recommended to enable the project continuity. KWS should allocate more resources for BSP activities and should be a key contributor to the
- 8. Other habitats where Bongo existence has been found should as a matter of urgency be conserved and protected; these include Mau Forest, Cherangani Hills. This is also likely to enhance genetic diversity.
- 9. The school wildlife/ Bongo Clubs Patrons should be trained on conservation to enable them impart relevant skills to the pupils.

## (vi) Extent of Fulfillment of the Project Terms of Reference

[Evaluation of the level of fulfillment of the TOR was given a score of 1 to 10 with 1 being the lowest score signifying the lowest level of achievement and 10 being the highest score signifying the highest level of achievement]

The following is a summary of extent of projects achievements:

1. [Mobilization of community members to participate in project implementation as local collaborators and informers]: The main achievement was the creation of acceptance of the BSP project to the community as evidenced by the local community and pupils' acceptance to actively participate in the project as seen through consultant's field visits.

2. [Acquire all the necessary project equipment and facilities as envisaged in the project proposal document]: The BSP team used the equipment provided very effectively i.e. GPS equipment, trap cameras, satellite phone. They were able to document existence of the Bongo in the wild.

3. [Recruit, train and motivate informers, field crew and supervisors as necessary to accomplish the project successfully]: The BSP surveillance team was very active in the field and collected very useful and valuable information with scarce resources. A Base for the team was set at Sangare Ranch.

4. [Provide necessary communication apparatus and aircraft needed to ensure proper surveillance is achieved]: Patrols, both aerial and ground were very successful and effective. Information and data collected was speedily relayed from aerial reconnaissance to the ground patrol team and KWS for action.

5. [Design and produce publicity materials for the Bongo project mainly news letters, fliers and caps]: Large format posters and tri-fold A4 brochures were produced and displayed at strategic places i.e. in market centres, bars which created a lot of awareness to local residents on Bongo conservation. The Bongo posters and classrooms with Bongo materials were effective tools in awareness creation initiatives.

6. [Ensure project sponsors logos are incorporated in all publicity materials and ensure approval of contents and displays are obtained from the SGP office prior to production]: The project sponsors logos were embedded in reports and posters and reports.

7. [Monitoring and evaluation of project implementation activities]: Reports were routinely made and documentation made i.e. tranche reports and school clubs activity reports. A schools clubs coordinator was employed by the project and documented and coordinated their activities.

8. [Receipt, utilization and accounting of the project funds and revenue]: The project funds were used for designated activities and where there was a deviation; communication was made to the development partners. In some instances, Rhino Ark Charitable Trust added their contribution where shortfalls occurred. All evidence of expenditure was put in the reports i.e. receipts and payments vouchers et al were kept and photocopied for future reference. Tranche reports were made on funds disbursed for BSP project activities.

9. [Liaison with Kenya Wildlife personnel as necessary on all project implementation activities]: KWS provided security assistance and access to the parks for ground and aerial surveillance. They also provided buses for pupils, club patrons and community members for touring parks and other educational centres.

10. [Jointly with project partners make and review decisions on which sites to conduct surveillance based on new information, findings and research outcomes]: There were systematic patrols made in collaboration with KWS. This activity established that there was evidence of Bongo existence in the wild. Very valuable scientific data was collected and documented. Much more information was collected than was previously available.

11. [Sustain an outreach project for communities and school going children around the Bongo prevalence area to learn more about the Bongo ecology]: Wildlife clubs were established in six schools in Aberdares and Mt. Kenya and are operational. The clubs and community engaged in other synergy projects like tree planting, fish farming et al. educational trips and environmental days were also a core part of clubs activities. Other schools in Mt. Kenya and Aberdares have expressed interest in forming and participating in wildlife clubs involved in Bongo conservation.

12. [Prepare and submit all narrative and financial reports to SGP]: Tranche reports were made and submitted to the management team and SGP headquarters documenting all activities undertaken

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#### 1 INTRODUCTION

## 1.1 Background

The mountain bongo antelope (*Boocercus eurycerus Isaaci*) is a rare species that by the 1990's was thought to be wiped out in Kenya. The Bongo Surveillance Programme (BSP) is a community driven conservation initiative that was established in 2004 to protect and investigate the status of the remaining wild Bongo. Among its core activities are:

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#### 1.2 UNDP GEF SGP Grant

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The project impact assessment evaluation covers the period starting year 2007 to December 2009.

## 1.3 Key project partners and stakeholders

The key partners and stake holders in the project included the following:

- Rhino Ark Charitable Trust
- Kenya Wildlife Service (KWS)
- National Museums of Kenya (NMK)
- Rare Species Organization
- University of Nairobi
- Kenya Forest Service (KFS)
- Woburn Safaris (UK)
- Wildlife Clubs of Kenya
- International Livestock Research Institute (ILRI)
- Local community
- Schools bordering Aberdares and Mt. Kenya ecosystems
- Research institutions



Bongo wildlife club students of Kamburaini Primary School present their Bongo sculpture

#### 2 METHODOLOGY OF IMPACT ASSESSMENT

## 2.1 Data and information collection

The following methods were deployed in the impact assessment initiative:

- Inception brief by Rhino Ark through the Resource Development Manager
- Review of project documentation
- Field visits to project areas
- Oral interviews with the Rhino Ark Projects development manager, core BSP team, trackers, Research scientist from Rhino Ark, KWS personnel, Patrons of Bongo Wildlife clubs, community representatives, and pupils who are members of Bongo Wildlife Clubs
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Data and information was collected from the project management team at Rhino Ark Headquarters and facilitated by Resource Development Manager. Relevant project documentation review was done. Meetings with BSP implementation team on the ground were done i.e. at Sangare Ranch; also there were interviews with trackers and Aberdares Park Management at Mweiga with the assistant director and education warden, school clubs patrons, community members and pupils in wildlife clubs.

The following persons were visited during the course of impact assessment activities:

- Mr. Eric Kihiu (Rhino Ark Headquarters Resource Development Manager).
- Mr. Mike Prettejohn (BSP Project Manager)
- Mr. Robert Njue (Assistant Director, Mountain Conservation area)
- Mr. Adam Mwangi (Coordinator, Bongo Research)
- Mrs. Joyce Kurui (Education Warden, Aberdare National Park)
- Mr. Peter Mwangi (Honorary Warden)
- Mr. Bernard Ngoru (KWS Research Scientist in charge of Mountain Area)
- Mr. Peter Munene (coordinator, Bongo Wildlife Clubs)
- Mr. Joseph Maina Kagunda (Tracker)
- Mr. Boniface Nderitu (Tracker)
- Mr. Josphat Murage (Tracker)
- Mr. Stephen Muthigani (Headmaster Kamburaini Primary School), Mr. Samson Gitonga (Club Patron), Mr. Joseph Mungai (Parent representative), Naomi Nyawira (Parent Representative. All from Kamburaini. The club members met from the school included: Judy Makena, Consolata Kanini, Mary Muthoni, Jeremiah Lailang', Stephen Gitonga
- Joseph Theuri Gitonga (Fence Scout)

- John Muriithi (community Scout/volunteer)
- Mr. Frank Ngari (Headmaster Karurumo Primary School), Mr. Festus M. Kamau (Club Patron and Mr. John Mugo (community member from Karurumo). The club members met from the school included: Bernard Mwangi, Peter Njuguna, Eric Thuo, Ruth Njoki, Jackline Wangui
- Mr. Harry Thuku (Club Patron Gathirathiru Primary School). Mr. George S. Muriithi (community member). The club members met from the school included: Millicent Muthoni, Grace Wakio, Martin Ngatia, Charles Munene
- Charles Kimondo Mathai (Club Patron Bondeni Primary School). The following parents from Bondeni were also interviewed; Mr. Stephen Macharia Kingori, Mr. Simon Gichengo, Mr. Peter Maina kibuka. The club members met from the school included: Nathaniel Omuka, Nelson Muriithi, Mary Wamucii and Catherine Muthoni

The impact assessment exercise commenced on 19th April and ended on May 4th, 2010



Consultant (left) interviews BSP team leader Mike Prettejohn

## 3 ASSESSMENT FINDINGS

## 3.1 Air and Ground Surveillance

There were several activities carried out over the grant period, therefore the following table shows the Bongo surveillance activities carried out during the course of project implementation:

Table 3.1: Matrix showing various project activities during the grant period

Date	Activity	Findings	
September/ October 2007			
Mt. Kenya	Informers reporting Air and ground surveillance	<ul> <li>Difficulties with KWS on access to the forest encountered. Issue later resolved</li> <li>team experiences sickness</li> <li>a 16 day surveillance was done on the ground</li> <li>6 samples of fresh Bongo dung taken for storage and DNA analysis to ILRI until funding was available</li> <li>signs of illegal poaching with dogs seen</li> <li>flight survey done between Kamweti and Irangi areas</li> <li>Acquisition of hardware items</li> </ul>	
Aberdares	Air surveillance	<ul> <li>A helicopter was donated to the team for food and personnel drop to a remote area</li> <li>GPS mapping was done</li> <li>Signs of Bongo existence seen</li> <li>A cave camp was seen with food and cooking utensils</li> <li>UNDP grant aided in stepping up activities for the surveillance team</li> <li>camera traps were donated by a donor from Rare Species organization which were found to be of poor quality and defective</li> <li>in the Northern areas, snares and carcasses were seen as well as logging</li> <li>more wardens were stationed in the park</li> <li>Informers continued to give names of persons engaged in illegal activity in the park. No feed back was give to the team by KWS afterwards on action taken</li> </ul>	
November - December 2007			
Aberdares	Bongo Surveillance activities	<ul> <li>four wildlife clubs along forest edge of Eastern Aberdares were established</li> <li>air surveillance was curtailed by KWS policy on access to the parks</li> <li>informers in Eastern Aberdares and South West Mt.</li> </ul>	

Date	Activity	Findings	
		<ul> <li>Kenya were active and collaborated with provincial administration</li> <li>7 Trap cameras were stationed and images were taken of Honi Bongo herd</li> <li>trap cameras were installed on areas suspected to have Bongo Populations</li> <li>signs of illegal entry into the park were seen</li> <li>Swara magazine requested update of surveillance activities</li> <li>Southern areas of Mathioya and Gura was surveyed by informers</li> <li>8 snares were retrieved in above areas with Bongo tracks seen and tracks of two men with dogs</li> <li>in Northern area, illegal logging was seen; one cedar tree had been cut and two named poachers identified</li> <li>At the South Eastern areas, a herd of 13 Bongos were seen 4 of which were young ones. A 30 ft snare was retrieved and two skeletons of elephant without tusks seen</li> <li>4 dogs were shot by KWS rangers but poachers got away</li> <li>In Southern Maragua, a fresh Bongo spoor was found. Charcoal was seen and a snare retrieved</li> </ul>	
Mt. Kenya	Ground surveillance	<ul> <li>old and fresh Bongo dung found</li> <li>poachers and signs of illegal tracking with dogs seen as well as buffalo remains by 5 surveillance team members and 2 informers</li> </ul>	
January – February 2008			
Mount Kenya	Ground surveillance and consultation with KWS	<ul> <li>meeting held with senior warden and deputy on the BSP project</li> <li>names and identification card numbers of the team were registered with KWS</li> <li>it was decided that the team would work with KWS and Mt. Kenya Woodley Wildlife Trust with their own equipment and also work independently</li> <li>A trap camera was set up at Mountain Lodge.</li> <li>Images of many animals with snares were seen there</li> <li>Bongo tracks seen in Ragati area and about 15 Bongo were estimated to be inhabiting the area</li> <li>area was found to be highly inaccessible hence little human activities seen</li> <li>12 samples of fresh dung were collected for DNA analysis and GPS coordinates were taken</li> <li>samples of vegetation noted to be preferred by Bongo were taken for identification by scientists</li> </ul>	
March 2008		trap cameras were set up	

Date	Activity	Findings	
Aberdares	Ground surveillance	<ul> <li>main activities were camera traps inspection</li> <li>restrictions on the surveillance group by KWS was still in force for the BSP team</li> <li>Images of Honi Bongo group were taken and most of the animals could be identified since they were permanent in the area because it was inaccessible to human encroachment</li> <li>in the southern areas Bongo tracks were seen</li> <li>some cameras were found to be missing and one was taken to USA for repairs</li> <li>it was identified that trap cameras were not adequate for the area</li> <li>visits to 4 school wildlife clubs was made</li> </ul>	
April to June,	Ground surveillance	<ul> <li>tracks of Ragati group of Bongo were seen</li> <li>trap cameras inspection was done</li> <li>6 dung samples were taken for DNA profiling to ILRI</li> <li>No school wildlife clubs were operational at this period</li> <li>further grant applications were made</li> <li>little surveillance activity was done in the eastern areas of the forest</li> <li>standard newspaper published a double page article on Mountain Bongo as a result of BSP activities</li> <li>Swara Magazine committed to publish a 7 page article on Mountain Bongo which was done in the preceding issue</li> </ul>	
2008	G 1.0 '11		
Mt. Kenya	Ground Surveillance	<ul> <li>Two images of young Bongos captured above Ragati to the South East</li> <li>Signs of poaching i.e. snares, dogs found in this area</li> <li>A trip to Mt. Kenya Game Ranch by the BSP team was made where 6-8 males were being prepared for release to the wild, a decision to place monitoring devices on their horns was made for tracking purposes</li> <li>DNA profiling through use of local and repatriated Bongos was made to determine their relationship to help in curbing inbreeding issues</li> <li>Issues of funding for DNA profiling were brought up because it could not be done locally</li> <li>A web site was established during this period on Bongo i.e. www.mountainbongo.org</li> <li>Articles were written in the Standard Newspaper and Swara Magazine on Bongo conservation</li> <li>First phase of UNDP grant was completed and subsequent approvals were made by UNDP for release of second tranche of funds through Rhino Ark Charitable Trust</li> </ul>	
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Date	Activity	Findings	
	surveillance	<ul> <li>the North of Kanjuiri area</li> <li>Poaching and logging evidence seen and from information gathered by informers and field team</li> <li>Two camera traps were lost</li> <li>Replacement cameras were placed</li> <li>Fresh Bongo tracks were seen</li> <li>The ground team found four poacher tracks with dogs to the South East and some dogs were shot by rangers</li> <li>A cable wire snare was removed</li> <li>Cedar posts extraction was seen with five trees cut</li> <li>Two trap cameras were set at Kiandongoro to the South East between Maragua and Kiambogo Rivers</li> <li>Lots of poaching activity was evident in this area with buffalo carcasses found</li> <li>One poacher had his picture taken</li> <li>Recce flight were taken along the Aberdares fence</li> <li>Cattle and sheep were seen in the forest</li> <li>With grants for wildlife clubs, two new clubs were established in Ragati area of Mt. Kenya</li> </ul>	
July 2008			
Aberdares	Ground and Air surveillance	<ul> <li>Flight made in Kanjuiri area</li> <li>Operations to recover stolen cameras were done and names of suspects given by Kamburaini club and information passed on to KWS</li> <li>Replacement cameras were placed at a salt lick. No Bongo images were taken there</li> <li>Signs of logging and snares were found</li> <li>Trips and stake outs at the Salient area done for the Honi group of Bongo with KWS rangers and visitors</li> <li>The team visited other remote salt licks in the area and captured on a digital camera a Bongo cow and calf</li> <li>Tracks of Bongo were found in the Hagenia Forest above Wandare</li> <li>Story of the team activities for the trip posted at www.mountainbongo.org</li> <li>Scientists from KWS requested for participation in the surveillance activities and agree to cover DNA profiling activities</li> </ul>	
Mt. Kenya	Ground and Air surveillance	<ul> <li>Flights made over Ragati area to the South West</li> <li>Evidence of tree cutting and charcoal burning found</li> <li>Equipment and charcoal found and confiscated and handed over to Ragati Forester</li> <li>A Campsite was destroyed but two men escaped</li> <li>Fresh Bongo tracks were found</li> <li>Camera site were visited and Bongo tracks were seen</li> <li>A gang of charcoal burners was found with remains of a snared bush buck</li> </ul>	

Date	Activity	Findings	
		Snaring was found to be happening around the mountain lodge	
August – September 2008			
Mt. Kenya	Ground surveillance	<ul> <li>Little activity for two months</li> <li>Two Trap cameras monitoring continued being done in SW area of Ragati</li> <li>A camera chip was found to be faulty</li> <li>No images of Bongo taken but other animal species images were</li> <li>No Bongo tracks seen and no evidence of poaching</li> <li>More recess were planned for November/December and replacement of cameras</li> <li>Surveillance team identifies a need to work with other stakeholders i.e. Mt. Kenya Woodley Trust</li> </ul>	
Aberdares	Ground and Air surveillance	replacement of cameras  • Surveillance team identifies a need to work with other	

Date	Activity	Findings	
October –		<ul> <li>Signs of intensive poaching seen with carcasses of buffalo and other animals seen</li> <li>KWS reported that there were Bongo tracks seen at a salt lick in Gura/Chania area of S.E Aberdares</li> <li>Surveillance done in the area</li> <li>Garmen map done but no signs of Bongo seen.</li> <li>The flight path identifies timber post and domestic stock \cleared land seen around Mathioya</li> <li>Bongo signs found</li> <li>A poached buffalo seen</li> </ul>	
December, 2008			
Aberdares	Air surveillance	<ul> <li>Livestock, shambas and tree destruction in the forest seen.         Livestock was being allowed in the forest but some were beyond allowed areas high up along rivers and tracks going up to bamboo zone.</li> <li>Some stock found to be 4 kilometers inside the park above Wandare's gate</li> <li>Shambas seen either of tobacco or bhang on regions near Mathioya River and Maragua River</li> <li>Slight lumbering seen</li> <li>Extensive deforestation between Uasso Nyiro and Ngobit Rivers above Nbaringo and Bellevue seen to have taken place</li> </ul>	
Southern Aberdare region	Ground surveillance	<ul> <li>A 21 day surveillance operation undertaken moving north to N. Mathoya and Gura Rivers and odd Bongo Tracks observed</li> <li>No specific permanent Bongo habitat discovered to enable establishment of a trap camera</li> <li>Poachers snares taken and camps discovered by the team</li> <li>Shamba seen from air not found on the ground</li> </ul>	
Central Aberdares	Ground surveillance	<ul> <li>Two poachers camps with teams of dogs found</li> <li>Snares found</li> <li>Remains of two poached buffaloes found</li> <li>No bongo tracks established</li> <li>Camera trap set in a swampy glade</li> </ul>	
North Aberdares	Ground surveillance	<ul> <li>Surveillance points marked on Garmen maps showing various activities</li> <li>Extensive deforestation noted of cedar</li> <li>Remains of many poached animals discovered</li> <li>Poachers equipment including band saws, snares and utensils were confiscated</li> <li>Images of the same taken</li> <li>No signs of Bongo found in the area</li> <li>Tracks of Bongo found high up on bamboo zone on the moorland edge</li> <li>At Kanjwiri Hill, signs of human intrusion observed</li> </ul>	

Date	Activity	Findings	
		<ul> <li>Bongo tracks seen at two salt licks</li> <li>Cameras installed at the salt lick location</li> <li>Mapping done by GPS</li> <li>Two cameras presumed stolen were missing</li> <li>There was a need identified for monitoring this group of Bongo</li> </ul>	
Mt. Kenya	Air surveillance	<ul> <li>Route map drawn on Garmen map</li> <li>No signs of tree cutting or shambas seen and the forest is in good state</li> <li>8 days spent in inspecting and replacing cameras and one found to be faulty</li> <li>Bongospoor seen from Ragati to Embu side of Kamweti and Irangi</li> <li>Garmen route map drawn</li> <li>No sign of poaching was reported on these areas.</li> </ul>	
February, 2009			
Whole of Aberdare Park	Extensive surveillance	<ul> <li>Air and ground surveillance done from the moorland zone to forest edge on eastern side</li> <li>Information on poaching activities passed on to KWS, also on shamba positions, timber extraction</li> <li>Illegal activities appear to be on increase attributed to drought and financial crunch. This is as seen on map details</li> <li>Surveillance on Southern regions of Maragua and Mathioya rivers was undertaken with GPS equipment but details could not be used in mapping due to ineffective equipment; manufacturers agree to upgrade the equipments</li> <li>Many snares retrieved</li> <li>Carcasses of giant forest hog, buffalo and bush buck found</li> <li>Lumbering discovered to be going on in the forest on lower regions falling between 7,000 – 8,000 ft altitude</li> <li>Forest department not able to man the Rhino Ark Fence; gates found to be easy to open and not manned</li> <li>Cattle gateways found to be open for 24 hours and stock and herders with their dogs enter at will to the park</li> <li>A need was found for a special community force to assist KWS and Forest Department in dealing with the above indicated issue</li> </ul>	
S.E Mt. Kenya	Ground surveillance	<ul> <li>No images of Bongo seen</li> <li>Signs of Bongo seen as previous in the same localities</li> <li>Illegal activities observed and reported to KWS and Forest personnel i.e. signs of poachers and dogs following on the Bongo Spoors and a camp with an old Bongo head placed on a tree with horns cut off</li> </ul>	

Date	Activity	Findings
		<ul> <li>Further patrol made with armed KWS rangers to catch and apprehend intruders</li> <li>One man captured</li> <li>To enhance on prevention of illegal activities indicated, a special force made of KWS and Bill Woodley Mountain Trust was tasked to assist</li> <li>Force operationalized but finances were inadequate to operate for at least an year</li> <li>Few animals seen, some with snares</li> <li>Surveillance maps and photos were made</li> <li>Surveillance team given uniforms and special rain gear</li> <li>School Wildlife Clubs were functioning well creating increased awareness on Bongo conservation.</li> </ul>
March 2009		
S.E Maragua	Air recces	Illegal timber extraction seen
and Mathioya	C	Shambas of tobacco and Bhang seen  The state of the
Maragua	Ground surveillance	<ul> <li>Two snares taken</li> <li>Remains of a Giant Forest Hog found</li> <li>Signs of four Bongo passing through the area were seen</li> <li>Bhang shamba viewed from air earlier not found by ground team</li> </ul>
Mathioya	Ground surveillance	<ul> <li>Exact location of six shambas of bhang and tobacco found</li> <li>42 snares retrieved as well as pit saws and equipment</li> <li>Permanent huts found</li> <li>Dogs were found to be present in the area</li> <li>no signs of Bongo seen</li> </ul>
Amboni River	Camera check	<ul> <li>Cameras checked every 14 days in the area</li> <li>Same herd of Bongo identified to have visited the tree observation area and were found to be present every 3-4 days</li> <li>Area undisturbed by human intrusion</li> <li>High altitude camera above Wandare's had not captured images of Bongo but other animals captured i.e. Buffallo, Bush buck, elephants, leopards and duiker</li> </ul>
N. Kanjwiri Hill	Camera check	<ul> <li>Cameras checked every 14 days in the area</li> <li>Presence of human intrusion noted</li> <li>Fresh Bongo dung and tracks seen between altitude of 7,000 m – 8,000 m</li> <li>Human and dog tracks observed</li> </ul>
April – Mid July 2009		
Aberdares Maragua and Mathioya Rivers	Ground and air surveillance	<ul> <li>Fresh Bongo tracks seen</li> <li>A young elephant carcass found</li> <li>snaring, logging seen</li> <li>information gathered passed on to KWS</li> <li>signs of human encroachment seen</li> <li>cameras around Honi area checked</li> </ul>

Date	Activity	Findings	
Mt.Kenya Ragati  July – September 2009	Ground surveillance	<ul> <li>images of Bongo taken by trap cameras around tree house observation point</li> <li>trap camera destroyed by an elephant</li> <li>Bad weather hampers flights. Only two flights undertaken. Livestock intrusion seen as well as deforestation.</li> <li>16 days spent in the field</li> <li>trap cameras checked</li> <li>random Bongo tracks seen</li> <li>signs of poachers and dogs seen</li> </ul>	
Aberdares  Mt. Kenya Ragati	Ground and Air surveillance  Ground Surveillance	<ul> <li>serious poaching reported to the North of the park</li> <li>Trap cameras around Kanjwiri took images of Bongo</li> <li>A Bongo cow with a deformed horn was killed by a lion</li> <li>snares were found and taken to KWS</li> <li>The team was subsequently provided with armed KWS rangers and retrieved a further 41 cable snares and six spiked logs</li> <li>several elephant carcasses were found with tusks removed</li> <li>the warden encountered poachers with hunting dogs. The dogs were shot but the poachers escaped</li> <li>thirty persons found in the park cutting grass and their equipment was confiscated</li> <li>flights taken over Eastern aAberdares showed a reduction of livestock encroaching on fenced area</li> <li>Trap cameras monitoring was done</li> <li>BSP team joins with Mountain Trust Ant Poaching team</li> <li>No signs of poaching seen</li> </ul>	
		<ul><li>Bongo tracks were seen</li><li>Human intrusion and cattle grazing seen in the park</li></ul>	
October – November 2009			
Mt. Kenya	Ground Surveillance	<ul> <li>Photos of combined field operations earlier highlighted were talken</li> <li>much tree destruction and poaching seen</li> <li>a picture of a young Bongo cow was taken by trap cameras</li> </ul>	
Aberdares	Ground and Air Surveillance	<ul> <li>Flights taken</li> <li>maps developed</li> <li>Human intrusion seen to have significantly reduced due to BSP activities and KWS</li> <li>Bongo tracks were seen</li> <li>Pupils of Kamburaini Primary pass on information to the team of illegal entry to the forest</li> <li>A pupil reports a honey hunter who has killed a Bongo.</li> </ul>	

Date	Activity	Findings	
		<ul> <li>The pupil educated and gave him a copy of Bongo poster and vowed never to kill another</li> <li>The poacher was tracked down and gave a lot of information on Bongo to the team. He and two of his team members were converted to be informers on Bongo</li> <li>more trap cameras were planned to be put in the area</li> <li>images of Bongo were taken of Honi group</li> <li>team spent 11 days in Maragua/Mathioya Rivers area and there was a reported livestock intrusion, charcoal burning and logging</li> <li>tracks of 5 Bongo were seen</li> </ul>	

## 3.2 Community Outreach/School Wildlife Clubs

The aim of school wildlife clubs was to conserve and protect the critically endangered Mountain Bongo by working together with the community and schools. This was done in collaboration with Kenya Wildlife Service (KWS). The Bongo Wildlife Clubs consists of approximately 40 children in each school with ages ranging from 10-12 years. The clubs have a patron who is usually a teacher in the school and a member of the community. The participating schools were selected due to their proximity to identified Mountain Bongo locations.

There was a negative mindset by the community about conservation in general hence the primary school pupils were chosen as entry points for the BSP project. The pupils also had a better capacity to implement and influence conservation activities and this worked. The project was also planned as a long term project hence young learners were chosen. In order to conserve the Bongo, there was an identified need that there was no need to employ big teams to provide security hence a need to make the community own the project. It would have been more costly to employ security also.

Another identified issue was that in order to conserve the Bongo, it was important to also protect their habitats hence tree planting initiatives and anti logging surveillance was done concurrently. Approximately 1,000 community members were involved in Mt. Kenya and Aberdares. The following table shows participating schools and their location:

**Table 3.2: Participating Schools and their location** 

	School	Area
Aberdares	Kamburaini Primary	North Aberdares
	Bondeni primary	Mid Aberdares
	Gichami Primary	South Aberdares
	Karurumo Primary	South Aberdares
Mt. Kenya	Kiangengi Primary	Ragati
	Gathirathiru Primary	Ragati

The schools wildlife activities were facilitated by the schools Wildlife Clubs Coordinator, a BSP team leader as well as members of the ground surveillance teams. The focus of the outreach activities was the local schools that were members of the Bongo Wildlife Clubs. There were 6 schools under this programme, 4 in Aberdares and 2 in Mount Kenya as indicated on the table above. Activities as indicated in the table above. The following were the activities they were engaged in:

- Schools Bongo drawing and essay competitions
- Bongo Surveillance Team Presentations/ Talks to schools on water and pollution
- Tree planting project in the schools
- Showing education films to schools
- Educational trips to national parks
- Production of Bongo conservation education posters for schools
- Setting up Bongo classrooms in each school



Bongo drawing by a student at Gathirathiru Primary School

Other activities that the clubs participated in include the following:

• In September 2008, 126 children who were members of the Schools Wildlife Clubs visited the Aberdare National Park. They were accompanied by 18 parents and 12 teachers and interacted with Aberdare park management and learnt about KWS operations, viewed and learnt about wildlife and nature.

- In October 2008 pupils from 5 schools with a total of 170 persons, including parents and 31 teachers visited the William Holden Educational Centre in Mt. Kenya and learnt about Bongo history, conservation and the communities' role in conserving Bongo habitats. They also learnt about the use of alternative fuels and its link to preserving Aberdare and Mt. Kenya ecosystems.
- In February 2009 pupils of Kamburaini Primary school in northern Aberdares built a sculpture of a Bongo in the school using locally available materials. The school is a member of the Bongo Wildlife Clubs.
- In March 2009, 56 large format (A1 size 594 x 841mm) framed posters and 1,000 trifold A4 size educational brochures about bongo conservation were produced for the participating schools.



Students at Gathirathiru Primary School show their bongo poster

The content for the posters/brochures was developed through a joint collaboration between the BSP, Rhino Ark and KWS. Kamburaini Primary school came up with the idea of putting a poster in a local pub. This was done because the people who carry out poaching in the area were known to visit the local pubs. By putting up a poster in the pub, they hoped to create greater awareness about the Bongo and its plight. This had a high impact.

#### 3.3 Future Recruitment of Schools

The Eburru School was in the early stages of establishing a Bongo Wild life club. This was as a result of identification of a small number of Bongo living in the forest in this area as a result of surveillance activities. Other schools which had expressed interest in the programme in 2008 included the following:

- Kiharo Primary School
- Kariki Primary School

## 3.4 Impacts of School Wildlife Clubs Activities

The following were the impacts of clubs initiatives:

- Over 2,800 trees of different species were planted
- Bongo drawings were done two times and another session scheduled for June, 2010 in all the six participating schools
- Essay writing was done twice in all the schools during the project period
- Environmental days were done once per year in all the six schools
- Snares arresting was done two times in each year in September and March
- School educational trips were done twice per year with approximately 60 pupils in total per trip in all schools by use of KWS bus
- Agricultural activities have been conducted once in 2010

## 3.5 Community Contribution to the Project

The following was the contribution of the community to the project:

- Moral support through involvement of elders was mooted as well as through attendance of Bongo conservation meetings
- The community members helped pupils in their activities i.e. planting trees
- The community also accepted to participate in the fuel use assessment at homes which was used to gauge fuel wood use
- The community volunteered in Bongo surveillance activities
- They also provided information on poaching, logging. Children reported their kin who were involved in tree cutting and poaching activities
- Members of the community were also involved in search and collection of snares
- Members who attended meetings briefed and educated other community members

## 3.6 BSP support activities

The BSP administrative unit provided backstopping support which included the following:

- The project provided transport, meals, information and equipment to the surveillance team
- They conducted awareness creation meetings and gave lectures on Bongo conservation
- They provided trap cameras which were also effective in capturing images of poachers
- Provided technical support i.e. air recce, food drops, training on use of trap cameras, GPS equipment
- All the other back stopping activities

#### 3.7 KWS support activities

The organization provided the following support to the project:

- KWS staff gave lectures on Bongo
- Provided buses at discounted rates on educational tours
- Educated pupils in the involved schools on conservation as a career and on livelihood improvement
- Provided security when surveillance activities were being implemented
- Provided information on where to search for Bongos existence

## 3.8 Level of fulfillment of project terms of reference

The table below shows the achievements of the project in fulfilling the terms of reference in the proposal document:

**Table 3.3: Project Achievements** 

TOR	Achievement		
Mobilization of	The BSP programme has created acceptance in the community for the		
community members to	project through education and awareness creation		
participate in project	The project introduced Bongo wildlife clubs in schools which were		
implementation as local collaborators and	effective tools in Bongo conservation. Karurumo Primary school pupils have even composed a Bongo poem		
informers			
imormers	The project has enhanced greater social interactions between primary schools. Schools without the Bongo Wildlife Clubs visit those with established clubs to learn about the mountain Bongo		
	The project significantly increased pupils with knowledge on conservation and they could perform many activities with no or minimal supervision i.e. caring for trees, molding of a Bongo statue at		
	Kamburaini Primary School		
	Pupils acquired knowledge on importance of voluntary work in conservation		
	Other schools have recently written letters requesting to be included in the BSP project i.e. Kiharo and Kariki Primary Schools		
	After project initiation in any of the six participating schools, follow- ups were made frequently and records kept on activities done during project implementation		
	Students involved in clubs reported improvement in school performance in nature based attributed to enhanced discipline and interest in acquiring conservation knowledge		
	Some former students in project primary schools have expressed interest in introducing Bongo conservation in their high schools where they were admitted		
	• Involvement of parents in the BSP project has enhanced conservation by enhancing cooperation and acceptance of the project to the community		
	Other synergy projects have been initiated which have enhanced BSP		

TOR	Achievement	
	activities i.e. the potato project where 70 parents are involved in Kamburaini, fish farming project where 70 parents are involved in Kamburaini and Bondeni, tree nursery project where 1,400 people are involved in Aberdares and Mt. Kenya  Level of community awareness has increased and many community members want to have audio visual material to learn more about the Bongo  The project restored the community confidence in KWS whereby there was a lot of hostility before project inception as they would always use force when dealing with the community  The project brought a new concept in management of natural resources whereby those destroying resources are used in their conservation i.e. incorporation of former poachers as trackers and educators  It inducted many youth in conservation programs i.e. in Kamburaini area  The project has created employment opportunities for surrounding community members in Mt. Kenya and Aberdares hence improving their livelihoods i.e. as trackers, scouts  The project has enhanced creativity in school children i.e. at Kamburaini Primary, an aptly named Bongo roundabout was made by pupils and a molding of a Bongo placed there which is made of locally available materials which explains the animal because its three dimensional  In primary schools, synergy projects like tree gardening, fish farming have made them become resource centers for community members which had led them to being replicated in homes  The project has led to development of leadership skills in primary schools for pupils in clubs  All the six participating schools have started synergy projects like tree farms, worm juice project in their compounds  School Bongo classes and clubs have been established in all six identified schools with Bongo materials i.e. bongo drawings, poems, posters where displays have been made  The Bongo Surveillance team devised new ways of dealing with poachers which was effective i.e. educating them on importance of conservation and taking photos of them as well as identification card numbers to	
	Rating: ★★★★★★★★☆ (9)	
Acquire all the necessary project equipment and	<ul> <li>BSP team base was set at Sangare Ranch</li> <li>Purchased tents, sleeping bags, raincoats and related items</li> </ul>	
facilities as envisaged in	Purchased satellite phone with GPS	
the project proposal	Purchased raincoats and haversacks	

TOR	Achievement		
document	Purchased camping bags		
	• gumboots		
	Rating: ★★★★★☆☆☆(6)		
Recruit, train and	The use of former illegal trackers has helped prevent existing poachers		
motivate informers, field	from going on with their activities and act as a deterrent which has		
crew and supervisors as	enabled conversion of former poachers to conservationists		
necessary to accomplish	• In Mt. Kenya, there were 4 informers while Aberdares had 13 who had		
the project successfully	voluntarily agreed to work with the BSP team and were trained by the honorary warden and were very useful in gathering information and		
	were rewarded with prizes when they passed on information i.e. torches		
	• Use of former poachers in the BSP project to track Bongos, find snares, provide education to community members and act as informers helped		
	in the BSP activities		
	<ul> <li>The community members involved in poaching have significantly reduced as a result of ground and air surveillance activities. Tree</li> </ul>		
	destruction and logging activities was also drastically reduced		
	attributed to pupils being scouts who reported illegal activities		
	Primary school pupils volunteered information on snares presence,		
	poaching i.e. in Kamburaini. Some pupils had turned to poachers and		
	were not going to school but the project created awareness which led		
	them to schools and enhanced their retention rate		
	Rating: ★★★★★★★☆☆(8)		
Provide necessary	Air and ground surveillance was extensively done which identified		
communication	difficult to reach areas where illegal activities like logging, charcoal		
apparatus and aircraft	burning, grazing of livestock in parks was happening		
needed to ensure proper	Low altitude surveillance by use of light air craft and helicopter was		
surveillance is achieved	deployed. This enabled assessment of large areas in the parks and		
	forests to identify signs of illegal activity and map coordinates for		
	action by the ground patrol team within a short span of time over large		
	areas.  Rating: ★★★★★★☆☆☆(7)		
Design and produce	In March 2009, 56 large format (A1 size – 594 x 841mm) framed		
publicity materials for	posters and 1,000 tri-fold A4 size educational brochures about bongo		
the Bongo project	conservation were produced for the participating schools. The content		
mainly news letters,	for the posters/brochures was developed through a joint collaboration		
fliers and caps	between the BSP, Rhino Ark and KWS. Kamburaini Primary school		
	came up with the idea of putting a poster in a local pub. This was done		
	because the people who carry out poaching in the area were known to		
	visit the local pubs. By putting up a poster in the pub, they hoped to		
	create greater awareness about the Bongo and its plight which had a		
	<ul><li>high impact.</li><li>Newsletters and fliers made</li></ul>		
	Informative posters were put at strategic points for easy viewing and in		

TOR	Achievement	
	<ul> <li>public areas i.e. Mwangaza pub in Mwangaza village which created awareness and aroused interest in Bongo conservation</li> <li>Information dissemination on posters was deemed to be effective because people passed on information on Bongo after seeing the displays in schools, tea collection center in Kangema, in a church at Bondeni, Kaburaini on Park gate and also posters at KWS headquarters</li> <li>Rating: ★★★★★★★★★ (9)</li> </ul>	
Ensure project sponsors	<ul> <li>Sponsors logos were embedded in all publicity materials seen i.e.</li> </ul>	
logos are incorporated in all publicity materials and ensure approval of contents and displays are obtained from the SGP office prior to production	reports, fliers and posters	
	Rating: ★★★★★★★★★(10)	
Monitoring and evaluation of project implementation activities	<ul> <li>Tranche reports were routinely done after each disbursement lapse</li> <li>An coordinator for School Wildlife Clubs (Mr. Peter Munene) was employed by the project</li> <li>The Rhino Ark team submitted reports to UNDP SGP/GEF office as was required</li> <li>All records i.e. financial and implementation reports were kept</li> <li>Rating: ★★★★★★★☆☆☆(7)</li> </ul>	
Receipt, utilization and	Project funds were controlled by authorized signatories to the project	
accounting of the project funds and revenue	<ul> <li>All approvals were sought before project money was disbursed to relevant persons</li> <li>Records of all expenses were kept including receipts and invoices</li> <li>Rating: ★★★★★★★★★(9)</li> </ul>	
Liaison with Kenya	A collaborative approach was achieved between the BSP team and KWS	
Wildlife personnel as necessary on all project implementation activities	<ul> <li>who performed the following functions:</li> <li>Gave lectures on Bongo to pupils and the community</li> <li>Provided buses at discounted rates for educational tours</li> <li>Educated pupils in the involved schools on conservation as a career and livelihood improvement</li> <li>Provided security when surveillance activities were being implemented in parks and forests</li> <li>Provided information on where to search for Bongos</li> <li>Audio visual shows were done for the community which had a great impact</li> <li>Rating: ★★★★★★☆☆☆(6)</li> </ul>	
Jointly with project partners make and review decisions on	• There was a systematic patrol of areas in which Bongo were previously found as well as in places where their existence was suspected. The information gathered was shared with KWS for action and	

TOR	Achievement	
which sites to conduct surveillance based on new information, findings and research outcomes	<ul> <li>collaborating organizations</li> <li>the project established that there are Bongo surviving in the wild</li> <li>Scientists involved in the project have created a world wide recognition of Bongo as a critically endangered species</li> <li>The government is now preparing a 10 year strategic plan on Bongo conservation</li> <li>Awareness creation was done locally and internationally which has aroused interest in Bongo conservation.</li> <li>much more information on Bongo was collected than was previously available</li> <li>A website on Bongo was established which enhanced awareness</li> </ul>	
	creation	
Sustain an outreach project for communities and school going children around the Bongo prevalence area to learn more about the Bongo ecology  Prepare and submit all	<ul> <li>Presently, the BSP programme has established six wild life clubs in six schools. These are in Aberdares and Mt. Kenya regions.</li> <li>These clubs established were avenues for pupils to learn about the environment and wildlife conservation specifically the mountain Bongo.</li> <li>They imparted knowledge on Bongo to their parents and community members as well as neighboring schools pupils who in turn developed interest in Bongo conservation.</li> <li>Over 2,800 trees of different species were planted in schools and homes</li> <li>Bongo drawings competitions were done two times and another session scheduled for June, 2010 in all the six participating schools</li> <li>Essay writing was done twice in all the schools during the project period</li> <li>Environmental days were done once per year in all the six schools</li> <li>Snares arresting was done two times in each year in September and March</li> <li>School educational trips were done twice per year with approximately 60 pupils in total per trip in all schools by use of KWS bus</li> <li>Agricultural activities have been conducted once in 2010</li> <li>Primary schools have continued to express interest in joining the BSP project since 2008 i.e. Kiharo Primary School, Kariki Primary School</li> <li>The BSP programme has created acceptance in the community for the project through education and awareness creation</li> <li>Rating: ★★★★★★★★☆(9)</li> <li>Narrative and financial reports were submitted to UNDP GEF/SGP in</li> </ul>	
narrative and financial	April 2008 and June, 2009	
reports to SGP	Rating: ★★★★★★★☆☆(8)	

#### 3.9 Field findings

- Inbreeding in the wild is a concern for the future survival of the Mountain Bongo hence its genetic diversity needs to **be** studied on a more intensive and structured level
- Lack of proper planning in releasing captive Bongos to the wild i.e. lack of genetic screening and issues of their security is a concern for the long term survival of the species
- Zoonotic diseases infecting Bongo have been found to have been caused by their interaction with livestock in forests and parks
- Bongos have been found to be infected with an unknown wasting disease affecting those repatriated from America whose ways of controlling is not known or causes.
- Habitat degradation is a threat to long term Bongo survival
- It was very expensive to conduct DNA profiling of Bongo in overseas labs. The procedures for obtaining permits were time consuming from the relevant authorities
- Bongo have been pushed to inaccessible areas and high up the mountains in harsh
  conditions as an adaptive measure from human activities hence it was found to be
  difficult to track and protect them
- Lack of deep freezing equipment for samples collected for DNA profiling was identified as an impediment to timely generation of scientific data
- There is Lack of artificial breeding of Bongo to enhance their survival
- Short tracking duration of between 2-3 weeks and follow-up activities were not consistent which affected the surveillance work
- the project established that there are Bongo surviving in the wild
- Scientists involved in the project have created a world wide recognition of Bongo as a critically endangered species
- The government is now preparing a 10 year strategic plan on Bongo conservation
- Awareness creation has been done locally and internationally which has aroused interest in Bongo conservation.
- Much more information on Bongo was collected than was previously available

#### 4 RECOMMENDATIONS

The following are recommendations as a result of evaluation exercise on BSP activities by the consultant:

- (i) Sports should be incorporated in conservation issues to help net more youth and nurture talents with prizes being given to help them invest in wildlife. There should be games and play competitions on Bongo to enhance their conservation in schools and the community and sporting kits provided for the same purpose
- (ii) Clubs coordinator should organize workshop trainings for school clubs patrons to educate them on conservation for them to gain technical knowledge so that students are not ahead of them
- (iii) To enhance livelihood aspects of the community for project sustainability, other synergy projects like use of solar energy, biogas should be incorporated in conservation projects
- (iv) There should be a scientific assessment of Bongo genetics to establish their diversity in all areas where they are found in the country.
- (v) The KWS should step up anti poaching activities in Aberdares and Mt. Kenya ecosystems
- (vi) The scope of Bongo surveillance activities should be expanded to all areas where they have been identified to be existing i.e. Mau and Cherangani Hills as a matter of priority and necessary funding provided by project partners
- (vii) Surveillance team should be employed on a full time basis and requisite remuneration with two teams at work at all times to enable continuous information and data gathering and timely identification of threats to Bongo existence
- (viii) Honey harvesters should be supported by the project with bee hives to be erected out of the forest to reduce fire incidents in the forest that threaten Bongo habitat as happened in year 2000
  - (ix) Community conservation groups could be provided with audio visual equipment which they can be used for showing conservation shows in the community and primary schools which was identified as having a high impact.
  - (x) The capacity of Bongo clubs should be enhanced to start income generation activities for sustainability i.e. bee keeping, bird keeping, organic farming, worm juice projects et al.
  - (xi) Utilization of local indigenous knowledge on Bongo should be explored and documented
- (xii) Cooperation between different stakeholders in conservation in Mt. Kenya i.e. KWS. Local community and BSP should be enhanced on the model replicated from Aberdares

- (xiii) The idea of conserving Bongos on their habitats i.e. near salt licks should be explored. Entry of hunting dongs must not be allowed into forests and parks because it causes mass migration of Bongos higher up the mountains
- (xiv) Use of modern technology intensively should be explored in Bongo conservation activities i.e. use of Geographic Information System to help in mapping out Bongo Habitats. Documentaries on the project should be made for future education to the community and school Bongo Clubs

# **APPENDICES**

- A. Questionnaire to relevant persons
- B. Photo log
- C. Schedule of persons interviewed

#### A. QUESTIONNAIRE

## List of questions

- 1. How many community members and their location/village/area name were involved in project implementation either as local collaborators/informers in both Aberdares and Mt. Kenya?
- 2. What are the equipment held by BSP acquired through the project? Were they sufficient/effective in the course of project activities? What were they being used for/purpose?
- 3. What was the partner's contribution (community, BSP and KWS)?
- 4. How many informers were recruited? How many were trained? How were they motivated to perform their duties? How many field crews and supervisors were recruited and their duties and responsibilities? What were the difficulties they encountered? What was the result/impact of their work to the success of the project?
- 5. What communication apparatus was availed to the project and who provided them? was there encountered difficulties in their use? Was there trained/designated staff to use them including use of aircraft? How often were they used? What were their impacts/results to the overall success of the project?
- 6. What type and number of publicity material was designed and used for the project? What was the frequency of their production and use?
- 7. Who were the project sponsors? What was the contribution from project sponsors?
- 8. Were their logos incorporated on publicity material? Were approvals granted by SGP on their use? Were there rejections? If any what was the reason?
- 9. Was there any monitoring or evaluation of the project activities? How frequent? What were the reports produced? Were there progress reports prepared and submitted to the national coordinator?
- 10. What were the projects systems put in place for receipt, utilization and accounting of project funds and revenue? What was the disbursement mode from SGP? Were all tranches released? Any delays in the course of project implementation and the causes? Was there any revenue generated by the BSP project? How were they used? Was staff engaged for accounting purposes? What were their qualifications? What were funds control and accounting mechanisms deployed by the project i.e. payment vouchers used, imprests et al?
- 11. What was the participation level of KWS? What activities were they involved in? Did they have financial or material contribution? Of what kind? Any challenges encountered while working with KWS?
- 12. Was there any new information, findings or research outcomes generated by the project that led to review of sites to conduct surveillance? What was the source of the information or who were the parties involved?
- 13. How many community outreach projects were initiated by the BSP? How many community members were involved in the project, How many and which schools were involved and their location? How were they chosen? How many clubs were initiated by the project and which ones are they /by name? How are they run and how/who funds them? what are their activities?
- 14. Was the baseline survey conducted? What was the outcome?
- 15. How frequent were narrative financial reports prepared? Were they submitted in a scheduled and timely manner to SGP? How were the project funds audited and by who?

## **BSP** project activities

- 1. Who are the partners who have collaborated in the BSP from 2007 2009 projects and what kind of support did they give (refer to collaboration with ILRI)?
- 2. What kind of scientific data has been generated since 2007 on Bongo?
- 3. How many community members have participated in patrol teams in Aberdares and Mt. Kenya? What benefits did they derive from the project?
- 4. What were or the nature of field surveillance activities? How frequently were they conducted?
- 5. Have the Bongo population been established in the two areas? What are the numbers?
- 6. What were the main impediments to ground and air surveillance activities (in terms of logistics, equipment, working conditions et al)?
- 7. What were the project strengths in the field?

## **Community/Schools projects**

- 1. What were the impediments to implementation of school/community projects
- 2. How many schools were involved?
- 3. What was the criterion used in their selection?
- 4. What were the school clubs activities?
- 5. Were there other synergy projects carried on together with the BSP project (to enhance impact of BSP)?
- 6. Who were the twinning partners and what was the nature of twinning programme/any future partners identified?
- 7. How many of the activities carried out were successful and what were their objectives?
- 8. What were the joint activities carried out in collaboration with the local community?
- 9. Which schools and when were they taken for video shows and educational trips?
- 10. How many community members were involved in the trips?
- 11. Which schools have wood lots/trees planted through the project initiative? How many are surviving?
- 12. Which schools participated in Bongo drawing and writing competition? How many pupils participated?
- 13. Where were the posters and leaflets on "Save the Bongo Poster" used/erected? Are they still being used?

#### **KWS**

- 1. Has the 10 year master plan on conservation of Bongo been finalized?
- 2. What are the key aspects of Bongo ecology?
- 3. What is their distribution? (In Mt. Kenya. Aberdares and nationally)
- 4. What are the Bongo numbers as in above 3 areas?
- 5. What are the threats to Bongo survival in above 3 areas?
- 6. What are the available resources for conservation of Bongo?
- 7. Is there any collaboration and of what kind between KWS and the local community in Bongo conservation)
- 8. What has KWS done to enhance Bongo conservation?
- 9. Who are the other partners that KWS has partnered with in the area of Bongo conservation in the two areas?

## **B. PHOTO LOG**



Examining a Bongo sculpture at Bondeni Primary



Consultant meeting with school Bongo club members at Bondeni Primary



Bongo poster at a bar near Gathirathiru Primary



Interviewing school patron at Gathirathiru Primary



A tree woodlot at <u>Karurumo</u> Primary school



A fish pond at Karurumo Primary



Consultant with the BSP Surveillance team and Eric (Rhino Ark))



A Bongo Poster at Kamburaini Primary School



Consultant interview with two Peter Munene and Joseph Kagunda at Sangare Ranch

## C. SCHEDULE OF PERSONS INTERVIEWED

Persons name	Contact address
Rhino Ark Headquarters (Mr. Eric Kihiu). Projects	0734 526021
Development Manager	
Sangare Ranch (Mr. Mike Prettejohn)	0733 642320
Mr. Robert Njue (Assistant Director, Mountain Conservation	0723 506409
area)	
Mr. Adam Mwangi (Coordinator, Bongo Research)	0721 479930
Mrs. Joyce Kurui (Education Warden, Aberdare National Park)	0721 136287
Mr. Peter Mwangi (Honorary Warden)	0725 225874
Mr. Bernard Ngoru (KWS Research Scientist incharge of	0721 521324
Mountain Area)	
Mr. Peter Munene Mutongu (coordinator, Bongo Wildlife	0721 748769
Clubs)	
Mr. Joseph Maina Kagunda (Tracker)	0729 844499
Mr. Boniface Nderitu (Tracker)	0723 805336
Mr. Josphat Murage (Tracker)	0726 402756
Mr. Stephen Muthigani (Headmaster Kamburaini Primary	0726 768140 (headmaster)
School), Mr. Samson Gitonga (Club Patron), Mr. Joseph	0723 563151 (Club Patron)
Mungai (Parent representative), Mrs. Naomi Nyawira (Parent	0721 931648 (parent)
Representative. All from Kamburaini. The club members met	
from the school included: Judy Makena, Consolata Kanini,	
Mary Muthoni, Jeremiah Lailang', Stephen Gitonga	
Joseph Theuri Gitonga (Fence Scout)	0723 387680
John Muriithi (community Scout –volunteer)	0725 051886
Mr. Frank Ngari (Headmaster Karurumo Primary School), Mr.	0733 436247/ 0718816526
Festus M. Kamau (Club Patron and Mr. John Mugo Wabuia	(H/master)
(community member from Karurumo). The club members met	0720 677298 (Club Patron)
from the school included: Bernard Mwangi, Peter Njuguna, Eric	0733 299180 (community
Thuo, Ruth Njoki, Jackline Wangui	member)
Charles Kimondo Mathai (Club Patron Bondeni Primary	0712 527023 (Club patron)
School). The following parents from Bondeni were also	
interviewed; Mr. Stephen Macharia Kingori, Mr. Simon	
Gichengo, Mr. Peter Maina kibuka. The club members met	
from the school included: Nathaniel Omuka, Nelson Muriithi,	
Mary Wamucii and Catherine Muthoni	
Mr. Harry Thuku (Club Patron Gathirathiru Primary School).	0727 877826 (Club Patron)
Mr. George S. Muriithi (community member). The club	0714 485637 (community
members met from the school included: Millicent Muthoni,	member)
Grace Wakio, Martin Ngatia, Charles Munene	