

# How to Protect Your Crops from Elephants



**A Handy Guide for Farmers and Forest Department**

**August 2012**



# How to Protect Your Crops from Elephants

## A Handy Guide for Farmers and Forest Department

<b>Published By</b>	Wildlife Research and Conservation Society.
<b>Supported by</b>	Asian Elephant Conservation Fund, United States Fish and Wildlife Service, USA
<b>Text</b>	Dr. Prachi Mehta
<b>Technical Inputs</b>	Dr. Prachi Mehta, Jayant Kulkarni and Umesh Hiremath
<b>Photographs</b>	Dr. Prachi Mehta
<b>Illustrations</b>	Tushar Pawar and Umesh Hiremath
<b>Citation</b>	Mehta, Prachi 2012. How to Protect your Crops from Elephants. A Handy Guide for farmers and Forest Department. Supported by Asian Elephant Conservation Fund, USFWS. Published by Wildlife Research and Conservation Society, Pune.

**Wildlife Research and Conservation Society**

1 A, Shriyog Society, 127/3, Sus Road

Pashan, Pune-411021

Maharashtra

Tel: 020-65222903/25871310

Email: mail@wrccindia.org

Website: www.wrccindia.org



## About this Project

A lot of research has been carried out on how to mitigate the elephant conflict but relatively little work has been done to test the effectiveness of the findings. Wildlife Research and Conservation Society, Pune (WRCS) initiated this project by implementing the use of low-cost and indigenous measures for mitigating elephant conflict in North Kanara District. The pilot project was supported by CEPF- ATREE Western Ghats Program. This project was successful in motivating the farmers in use of low-cost measures for crop protection. Following the success of the pilot project, Asian Elephant Conservation Fund (AECF), USFWS supported the ongoing project.

This small book is prepared with the objective of taking the concept of Community-based Conflict Management (CBCM) to the farmers. An attempt has been made to explain the methods of CBCM model in the form of a story so to make it interesting and simple for the local farmers and field staff. As a part of the public awareness program, this guide has been translated and printed in Kannada by Dr. Sunil Panwar, DCF Dandeli-Anshi Tiger Reserve. WRCS has distributed the Kannada version among farmers and field staff in the study area.

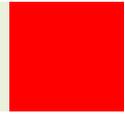
This project is a long-term initiative of WRCS for elephant conservation in North Kanara region. The current project is being implemented in Yellapur Division in North Kanara District where we have introduced a few more mitigation measures and have also initiated survey to monitor elephant movement in the area.

We are grateful to AECF and Dr. Meenakshi Nagendran, Program Officer, AECF for supporting this project. We thank the Karnataka Forest Department and local officers for their continued co-operation. And, we are hopeful that this project will help in easing the farmer's difficulties and securing Asian elephant's future in North Kanara landscape.

Prachi Mehta and Jayant Kulkarni  
WRCS, Pune







## Contents

	Page
<b>Introduction</b>	<b>1</b>
<b>Facts About Elephants</b>	<b>3</b>
<b>Elephants in India</b>	<b>4</b>
<b>Life of Elephants</b>	<b>6</b>
<b>Why Do Elephants Come to Feed in Our Farms</b>	<b>7</b>
<b>Which Type of Farms Attract the Elephants</b>	<b>8</b>
<b>How to Keep Elephants Out of Your Farm</b>	<b>9</b>
<b>How to Make Chilly Rope</b>	<b>10</b>
<b>How to Detect Elephants in the Night</b>	<b>13</b>
<b>How to Make Trip Alarm</b>	<b>14</b>
<b>How to Chase Elephants out of Your Farm</b>	<b>15</b>
<b>How to Monitor Elephant in Your Area</b>	<b>19</b>
<b>Why Do We Need To Conserve Elephants</b>	<b>20</b>
<b>4 Step Formula for Reducing Crop Damage</b>	<b>21</b>
<b>What to Do When</b>	<b>22</b>
<b>What Can We Do to Conserve Elephants</b>	<b>23</b>
<b>Some Important Information</b>	<b>24</b>
<b>Important Contact Numbers</b>	<b>27</b>



## Introduction

### Dear Readers,

*Namaskara!* I am Vasudev Narayan Hegde. I am 13 years old. I live with my *Appa* (father) Shri Narayan Hegde, *Avva* (mother) Shrimati Indumati Hegde and my 9 year old sister, *Sridevi* in Yellapur City. Although we live in a city, we look forward to spending our *Dussera* and *Dipawali* holidays in our grandparent's house in Janshettikoppa village in Yellapur Range. My *Ajja*, Mr. Chidambarayya has a big farm in which he grows paddy, beetle-nut, corn, sugarcane, cotton, coconut and bananas. He is 65 years old but is a very cheerful and energetic person. We all admire his stamina to work at his age.

However, two years ago, *Ajja* had fallen seriously ill and had to be hospitalized. I remember asking *Appa* the reason for *Ajja's* failing health. *Appa* had explained that since last 4 years, elephants were regularly visiting *Ajja's* farm to feed on paddy, sugarcane, maize and banana. They eat almost everything and leave very little for harvesting. So from August to January, *Ajja* had to work even harder to prevent elephants coming inside his farm. He had to keep awake the whole night to keep a look out for the elephants and during the day he had to work in the farm. All this took a toll on his health making him weak and tired.



**But now *Ajja* is HAPPY and so are WE !**

But this year, I noticed that *Ajja* was very relaxed, happy and is able to spend a lot of time with us. I asked *Ajja* “what is the secret of your good health this year?” *Ajja* told me the story behind his good health.

Last year, *Ajja* met Suresh Anna, who is a researcher from Pune in Maharashtra. Suresh Anna taught him to protect his crops from the elephants using simple and economical methods. He also gave lots of information on elephants and crop guarding. The forest department staff has also adopted these new methods so together they are able to protect the crops from elephants. Because of all this *Ajja* is relaxed and happy! *Hip hip hurray !*

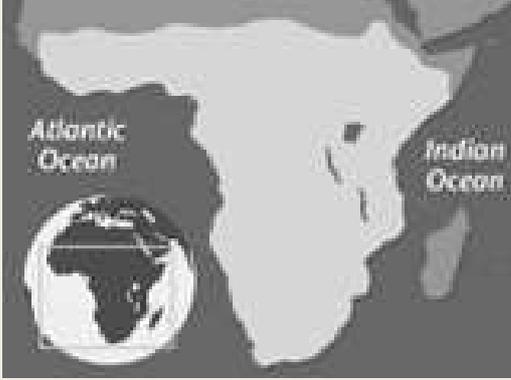
Last month, I also met Suresh Anna and Mr. Chandrakant Gowda, the Forest guard in *Ajja*'s farm. I asked so many questions to them and both provided me lot of interesting information on elephants.

During the holidays, I made a project on elephants for my school and was awarded a first prize for that. Everyone was very happy. Suresh Anna also helped me to make a small booklet on the project. I would like to share with you what I learnt about elephants through this small booklet. Please read on.



## Facts about Elephants

- Elephants are the largest living animals on land today!
- There are two species of elephants in the world, known as African elephant and Asian elephant. I will tell you about the difference between them.

African Elephants	Asian Elephants
<p>Are found in 37 countries in Africa, These include countries in south, Central and Western Africa. See the map below.</p>	<p>Are found in 14 countries in Asia. These countries are Bangladesh, Bhutan, Brunei, Cambodia, China, India, Indonesia, Laos, Malaysia, Myanmar, Nepal, Sri Lanka, Thailand and Vietnam shown in the map.</p>
	
<p>Their estimated population is between 4 to 6 lakhs</p>	<p>Their estimated population is between 41,000 to 52,000 of which India supports 28,000-30,000 elephants.</p>
<p>African elephant is larger than Asian species. The height can be up to 8 to 13 feet. Weight can be between 4000 to 7000 kg.</p>	<p>They can be about 8 to 10 feet. Weight can be between 3000 to 6000 kg.</p>
<p>Male and Females both have tusks. Have large ears.</p>	<p>Only Males have tusks. Females do not have tusks. Ears are smaller.</p>
	

## Elephants in India

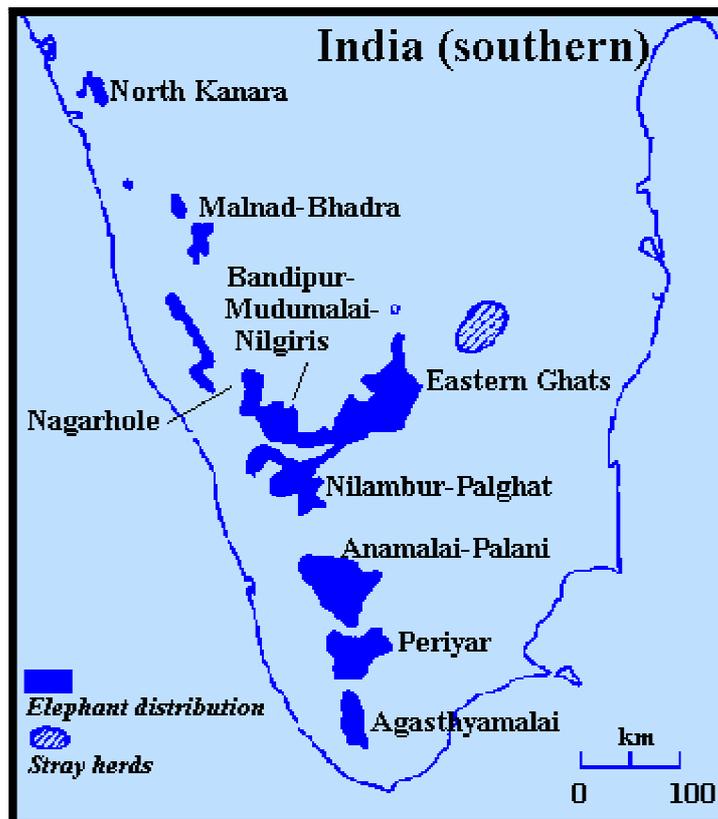
- India is called the “Land of elephants” because elephants are deeply associated in our culture, religion and festivals.
- According to the legend, once the gods and demons (*Deva and Asura*) churned the ocean (*sagar-manthan*) for obtaining the elixir (*amruth*) of life to make them immortal. Nine jewels (*navrathna*) emerged out of the sea as the symbol of elixir and one of them was the elephant. That is the reason in our culture, elephant is considered as a precious jewel that needs to be preserved.
- *Indra*, the lord of heaven, has elephant as his vehicle because it is the most powerful animal.
- The elephant-headed god or *Ganesh* is worshipped in the entire country as it is supposed to be a sign of prosperity and wealth.
- In North Kanara District, Idagunji and Gokarna are very famous for their unique Ganesh Temples.
- In Kerala, temple elephants are worshipped and during festivals these elephants have the privilege of carrying the deity to the temple.
- Because of these reasons, elephants are well protected in our country. India has about 24,000 to 28,000 elephants, i.e. about 53 % of total population of Asian elephants! So today the future of Asian elephant is best secured in India!



## Elephants in South India

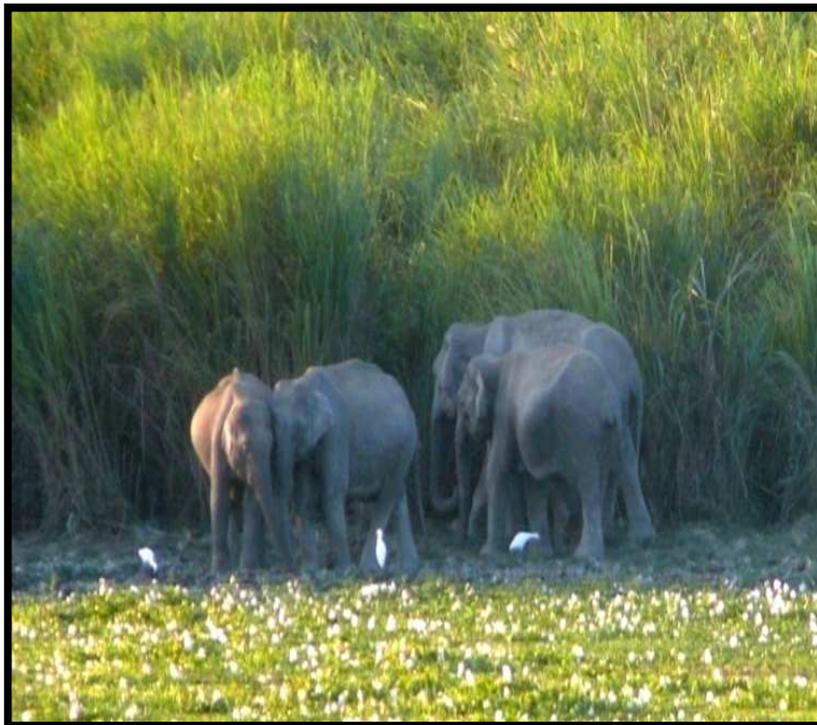
- The map below shows elephant populations in South India, i.e. Karnataka, Tamil Nadu and Kerala.
- There are about 14,000 elephants in these 3 states. Of these, about 4,000 to 6,000 elephants are in Karnataka i.e. 25 per cent of the country's population! So our state is very important for elephants.
- Our district, North Kanara is supposed to have about 60 to 80 elephants, i.e. about 0.1 per cent of the state's population!
- As you can see in the map, the North Kanara District population forms the northernmost limit of elephants in Karnataka. This is a small population and needs protection and only we can give it.

### Elephant Distribution in South India (Source: IISC, Bangalore)



## Life of Elephants

- Elephants have a long life of up to 80 years! Also the gestation period of 22 months, is the longest for any land mammals!
- Elephants require 150 kg of food and 100 liters of water daily! No wonder they are so huge in size!
- Like humans, elephants live in joint families. The family groups have grand-parents, parents, uncles, aunts, siblings and cousins staying together. The family groups are managed by grand-mothers, mothers and aunts. Young tuskers stay with the family groups.
- Adult tuskers do not stay with family groups and prefer to stay by themselves.
- Elephant brain weighs 5 kg which is the largest among land animals and that is why they are considered very intelligent and are capable of learning fast.
- They can communicate long distances using low-frequency (infrasound) sound which we humans cannot even hear!
- Much like humans, elephants have emotions such as happiness, pain and grief. When a member of their group dies, all others grieve by standing in a circle and touching the dead elephant with their trunk!



## Why do elephants come to eat crops in our farms?

**Shared Boundaries:** We know that many of our farms are located on the border of the forests. While feeding elephants come near the boundary of the forests and then enter our farms. And that is where they see a lot of crops available so they feed on them. No wild animals recognize man-made boundaries!!

**Disturbance in the Forests** Many times we see people cutting lots of trees, bamboo and grasses from the forests. . Fires in the forest also destroy trees and grasses. Because of all this, it is possible that there is a shortage of food plants for the elephants. Perhaps that is why the elephants are forced to look for food outside the forests

**Our farms are in their Home Ranges:** Some areas where we have our farms were earlier forests and elephants used to live there. Now since the farms are there, a part of their home is gone. Elephants have excellent memory so they still remember their old homes and visit these areas and instead of forests they enter our farms.

**Crops are plenty and tasty:** Elephants find our crops very tasty. They love to feed on paddy, corn, sugarcane, maize, sorghum, banana, jackfruit and all other types of vegetables. Also they find it convenient to feed on them as they don't have to go looking for different food items in the forests. Feeding on crops also saves their time and energy as a lot of food is available at one place.

**Opportunist feeders:** Elephants are very smart. They come to our crop fields at night when they know they will be safe as no one will be there. They can eat whatever they want and how much they want. That is why fields which are unguarded are always easy targets for the hungry elephants!



## Which type of farms attracts the elephants?

Suresh *Anna* explained to me that elephants raid crops in certain farms.

- Farms that are on the forest boundary so that that the elephants can quickly return to the forests
- Farms which are unguarded and away from houses so elephants can feed without being disturbed.
- Farms which has mature crops of paddy, sugarcane, corn, millet as they smell and taste delicious..

Therefore, *Ajja* started to guard the farm using simple methods. These methods are easy to implement, made from available material and are not costly. *Ajja* could easily get most of the material from his farm. *Ajja* says that if we start practicing crop guarding regularly it is easy to keep the elephants out of the crop fields.



## How to keep the elephants out of your farms

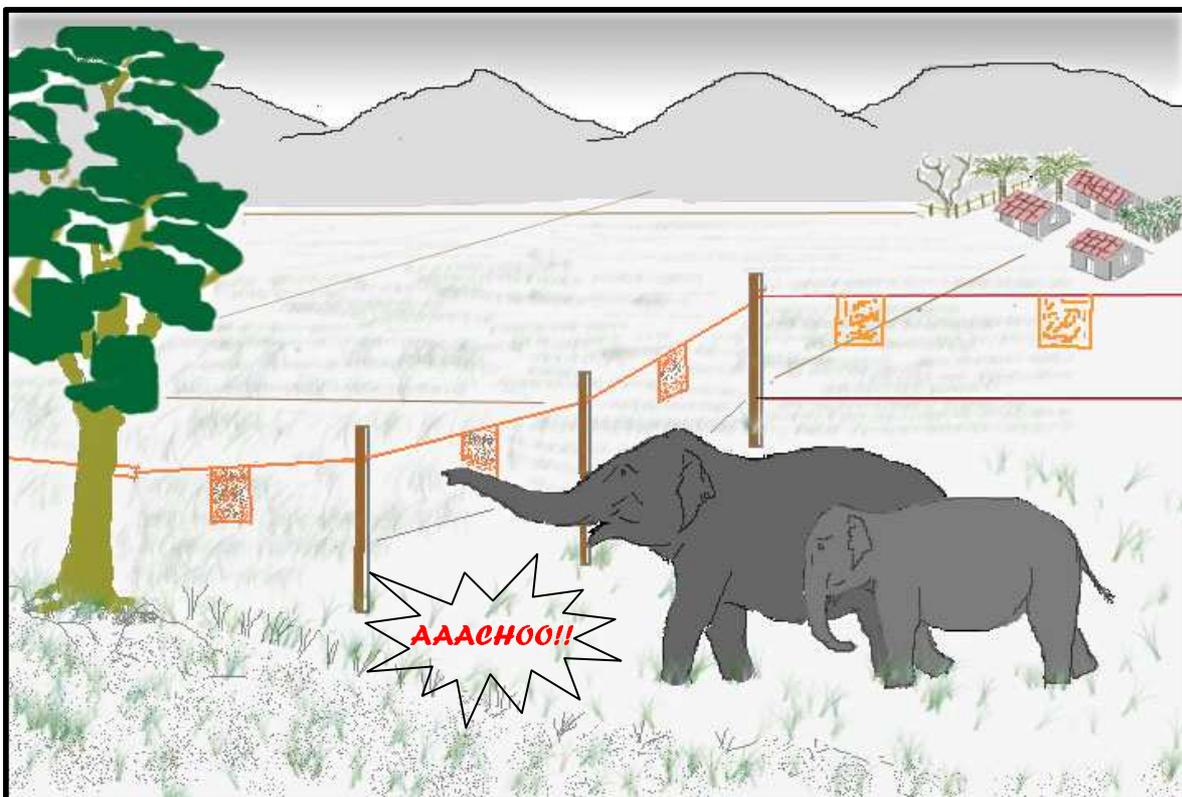
Elephants have strong sense of smell and they do not like the smell of chilly as it irritates their nose and eyes. Therefore, spicy chilly mixture acts as good barrier against elephants. But remember to use only spicy chilly pods such local variety of *guntur* chilly or spicy green chilly. These barriers are effective for preventing the entry of elephants and give us time to detect the elephants.

### Chilly Rope

Take very spicy variety of chilly pods, powder it, make into a thick paste with grease and engine oil and apply the paste on a coir rope. Hang this rope around the boundary of your farm. This is called the “Chilly Rope”. The smell of the chilly mixture is so strong that it masks the smell of ripe paddy also. When the paddy is in mature stage, the mixture should be applied every 3 days on the rope. And in rainy season, make sure that the mixture is applied daily.

### Chilly Curtain

Using the same method, we can use old clothes dipped in chilly mixture and hang it on the coir rope. This is called the “chilly curtain”.



## How to make the chilly rope

### Materials and cost for Chilly Rope

Item	Quantity	Cost (Rs.)
Coir Rope	25 m	25
Fresh Chilly Pods	1 kg	20
Tobacco Powder	50 g	5
Waster Grease	500 g	20
Waste Engine Oil	500 ml	20
Initial Cost for 25 m		90.00
Every 4th day re-application for 15 days		360.00

### Materials and cost for Chilly Curtain

Item	Quantity	Cost (Rs.)
Coir Rope	25 m	25
Old rags	15	0
Fresh Chilly Pods +Tobacco	1.5 kg	25
Waster Grease	500 g	20
Waste Engine Oil	500 ml	20
Initial Cost for 25 m		90.00
Every 4th day re-application for 15 days		110.00

### Preparation of Chilly Rope and Chilly Curtain by farmers



## About Chilly Smoke

Take an old used 5 litter tin and make small holes on the rim of the tin. On either side of the tin, attach a string and hang it on the farm boundary. Inside the tin, put some coal and dried hay on the bottom. On top of this, put 10-12 broken spicy chilly pods, some tobacco powder, some human hair, and paper. Cover it with a lid. Light up the coal at around 6.30 pm. The chilly smoke generated will be released through the holes in all direction and will remain in the air for 2 to 3 hours. One can put many such tins around the boundary of the farm to generate strong smoke. Chilly smoke can also be made with cardboard paper having the same ingredients and tied with newspaper like a *chudi* along the field boundary.



## How to make Chilly Smoke

### Materials and cost for tin chilly smoke

Item	Quantity	Cost (Rs.)
Chilly pods	50 g	5.00
Tobacco	50 g	7.00
5 lt old tin	5	25.00
Wire	2	5.00
Dry hay	50 g	0
Coal	50 g	20
Total Cost		52.00

### Materials and cost for *chudi* smoke

Item	Quantity	Cost (Rs.)
Cardboard	5	0
Chilly pods	50 g	5.00
Tobacco	50g	7.00
Dry hay	50 g	0
Total cost		12.00

### Chilly Dung Cake

Take fresh cow dung and mix it with broken chilly pods, tobacco, and discarded human hair and make a dung cake. Place the dung cakes on the farm boundary on a wooden pole. Light up the dung cake at around 6.30 pm so the chilly smoke will be generated and will remain in the air for 2 to 3 hours.

### Farmers preparing chilly smoke and chilly dung cake



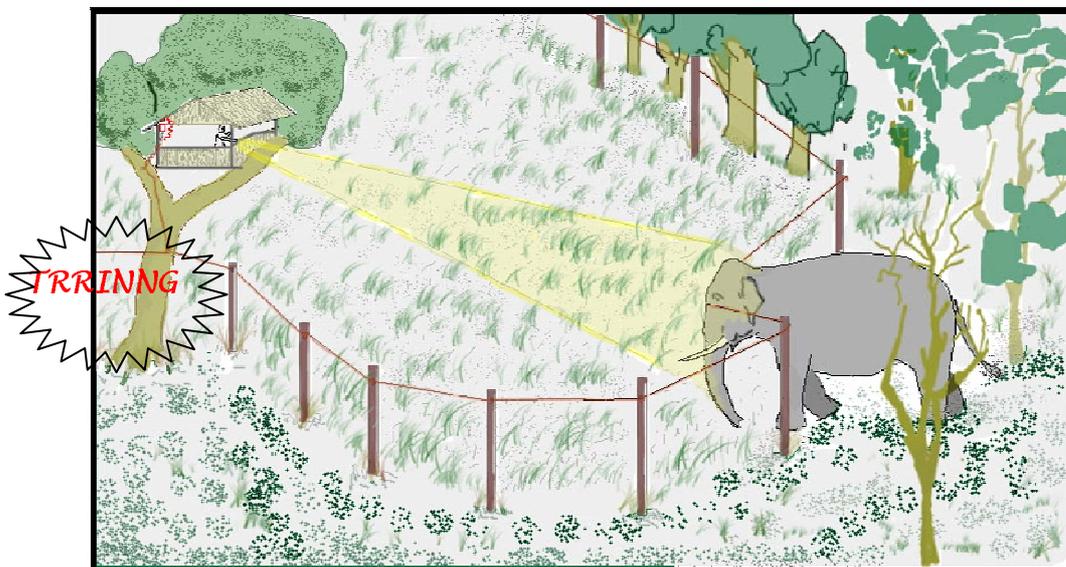
## How to detect elephants in the night

Elephants are clever animals and will enter the farm through any small section that is unprotected. And in the night it is difficult to see where they are in the farm. So for early detection, *Ajja* made a watch-tower (or *mada*) on a strong and sturdy tree. The tree-watchtower is on a 30 feet tree near the boundary with thatched roof and bamboo floor. *Ajja* has put mattress, blankets and a mosquito net in the *mada* so we could sleep in comfortably.

Two days ago, we were all sleeping on the *mada* when at about 11 pm the bell rang and we all got up. Now you will wonder which bell. Well, it is the bell of the TRIP ALARM.

*Ajja* has installed an early warning system called the “TRIP ALARM” in our farm. For the trip alarm, you have to purchase a thin nylon rope and a door bell. The nylon rope is placed on the border of the farm. And one end of the rope is attached to the toggle switch of a door bell that is installed on the tree- watchtower. At night when elephants tried to enter the farm, the rope got pulled and the bell rang loudly and all of us woke up.!

We quickly flashed the powerful torch light to see where the elephants were. We could see totally 7 elephants that night! These powerful torches are also very useful to confuse the elephants. When we shone the light on their eyes, they froze and could not move because the light blinds them and they cannot see anything in front of them. For the first time, we could see elephants feeding on our crops because we were on the watchtower and had powerful torches. Now I am convinced about the benefits of night-guarding and trip alarms.



## Low-cost Trip Alarm

### Materials and cost for Trip Alarm

Item	Quantity	Cost (Rs.)
Doorbell	01	110/130
Nylon thread	200 m	60
Battery switch	02	20
Clamp	1	35
Insulators	15	15
Initial Cost for 200 m		240-260

### Cost for the 3 cell torch

Item	Model	Cost (Rs.)
Eveready	1 wt	290
Ultima DL-23		
Eveready	3 wt	375
Ultima DL-65		
Eveready	3 wt	375
Ultima DL-66		

### Trip Alarm Set installed at Janshettikoppa village



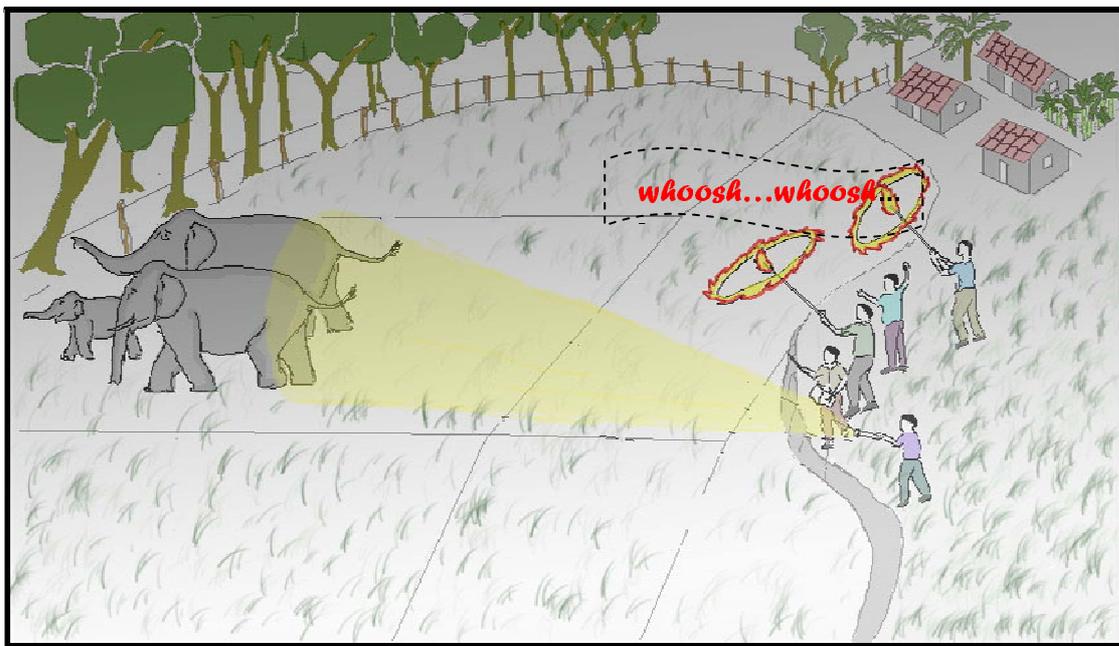
## How to chase the elephants out of your farm

After seeing 7 elephants, I was worried. How will we stop them from feeding on the crops? Earlier, *Ajja* used to call up the forest staff for help. It usually took anywhere between 1 hour to 3 hours for the staff to reach the farm and in that time a lot of the crop was already eaten by the elephants.

But this time I saw *Ajja* got help very quickly. As soon as he saw the elephants, he made one phone call to *Shomu Kaka* who was also doing night guarding in his farm and one more call was made to *Babu kaka* in the village. Within 5 minutes, about 8 to 10 *kakas* from the neighboring farms and 4 to 5 *kakas* from the village arrived in our farm. That was really fast and very efficient!

We know that all animals are scared of fire and large sound. Instead of using simple firecrackers, *Ajja* and his friends used new methods.

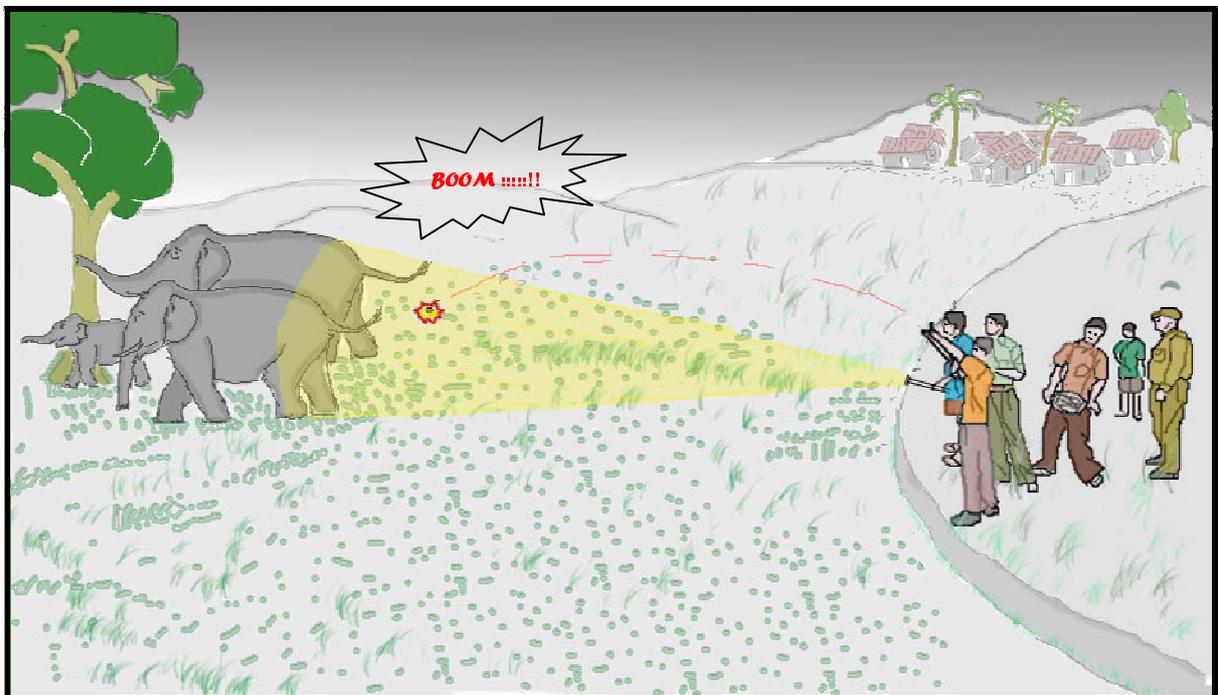
**Rotating Fire Ball:** *Ajja* had made a medium size ball of old thick cloth and tied it with a long steel chain. It was kept ready in the watch-tower. When he saw the elephants, he dipped the ball in kerosene and lit it. Then with the help of the chain, he rotated it up in the air. The ball made loud sounds such as “swoosh-swoosh-swoosh” and burnt brightly. It looked scary...like a huge Fire Ball! The elephants stopped feeding and froze there and slowly started going back to the forests! This simple trick is worth trying!



## What is a Catapult Bomb?

**Catapult Bomb:** Recently *Ajja* has purchased many local *chitbils* or catapults along with the firecracker bombs. These bombs have a slightly longer wick. He used the catapult to throw the bomb. The bombs are very small so it does NOT cause any harm to the elephants and the only advantage it has is that it can reach a little closer to the elephants so the elephants get startled and run away.

Within 10 minutes we chased 7 elephants out of our farm! That was really fast and easy. This way we protected our crops and did not harm the elephants also!



## How to make Catapult Bomb and Rotating Fire Ball

### Materials and cost for catapult Bomb

Item	Quantity	Cost (Rs.)
Long wick bomb	10 bombs	90
Catapult	01	30
Heavy Duty Rubber belt	01	30
Leather Chit	01	05
Initial cost for 10 bombs		155
Recurring Expenses		90

### Materials and cost for Rotating Fire Ball

Item	Quantity	Cost (Rs.)
Cloth ball	3 m	0
Steel chain	1 m	10
Kerosene		5
Total Cost for one operation		15

### Farmers using Catapult Bomb and Chilly Smoke to Chase elephants



## Elephants don't like some crops..!

We know elephants love to feed on paddy, sugarcane, corn, maize and most things grown in our farms. However we also need these crops so cannot stop growing them in our farms. But there are some crops that elephants don't like so they avoid areas which have such crops. We could try growing these crops along with our regular crops.

**Lemon:** Elephants do not like the smell of lemon. So *Ajja* has planted 50 lemon trees on the boundary of his farm. Now the trees have become big, thick and thorny. So elephants avoid the area with lemon trees! *Ajja* got so many lemon fruits that even after *Ajji* made the pickle, there were so many left that *Ajja* sold it in the market.

**Mango:** *Ajja* has planted many mango saplings near his house. Since it is near the house, elephants don't get a chance to feed on them and it is safe from monkeys also. This year we ate many mangoes, made pickle and also sold in the market.

**Agave and Cactus:** *Ajja* has also planted thorny plants of agave and cactus on the boundary of the farm. These plants grow tall and are thorny so the elephants find it difficult to enter through them.

Apart from these, there are many other species such as pepper, turmeric, ginger, raddish, mangni-ber (*Coleus* species) which can be experimented after discussing with officers from Forest Department and Horticulture department.

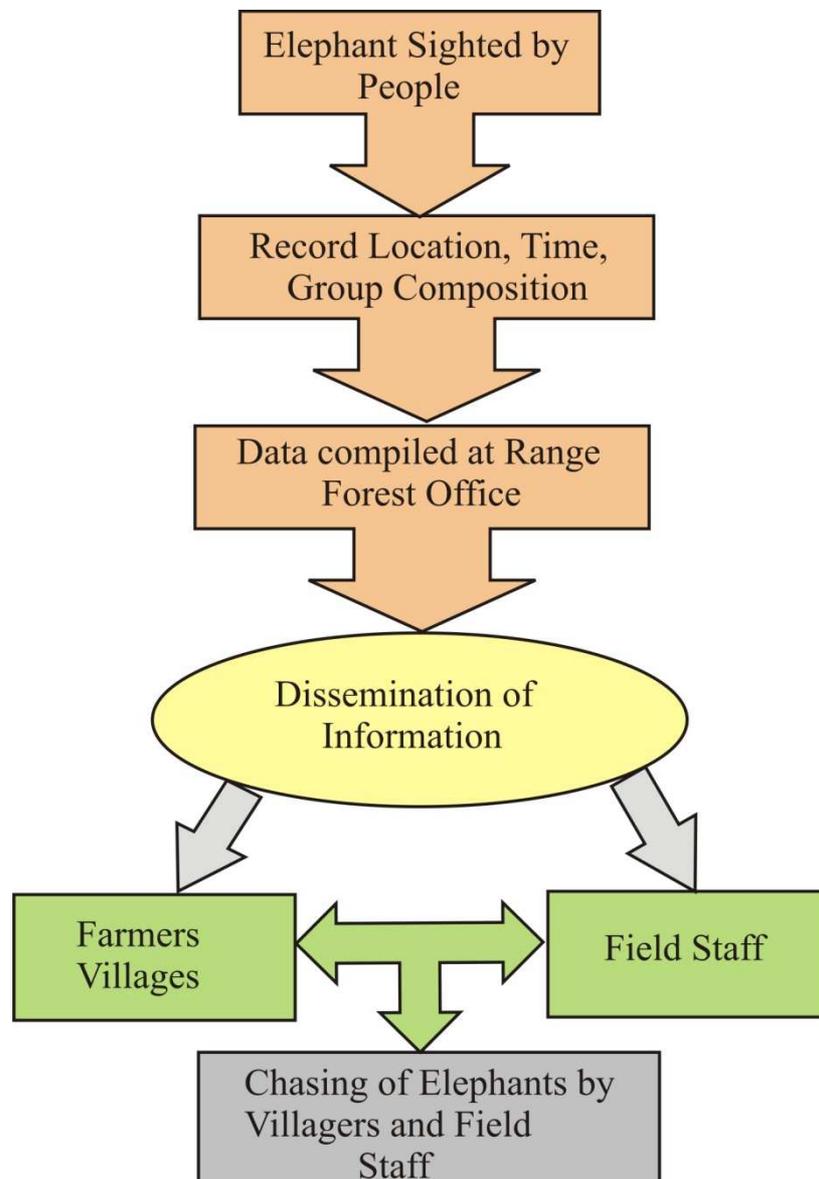
### **Bio-fence of lemon tree and cactus to prevent elephant from entering the farm**



## How to monitor elephant movement in your area

Suresh *Anna* told us that elephants have certain seasons and certain routes which they follow each year to come to feed on the crops. *Ajja* and his friends are now monitoring the movement of elephants regularly. Last week, *Ajja* and Deva Uncle saw 5 elephants near the dam. So they immediately noted down the details like date, time of the day, number of animals seen, and where they were going. They passed on this information to the farmers and field staff. The field staff and other villagers also record information when they see elephants, their foot prints, or their dung. Suresh *Anna* was saying that this information is very useful in understanding the movement of the elephants and alerting the farmers and field staff about which areas the elephants are moving.

### Monitoring of elephants

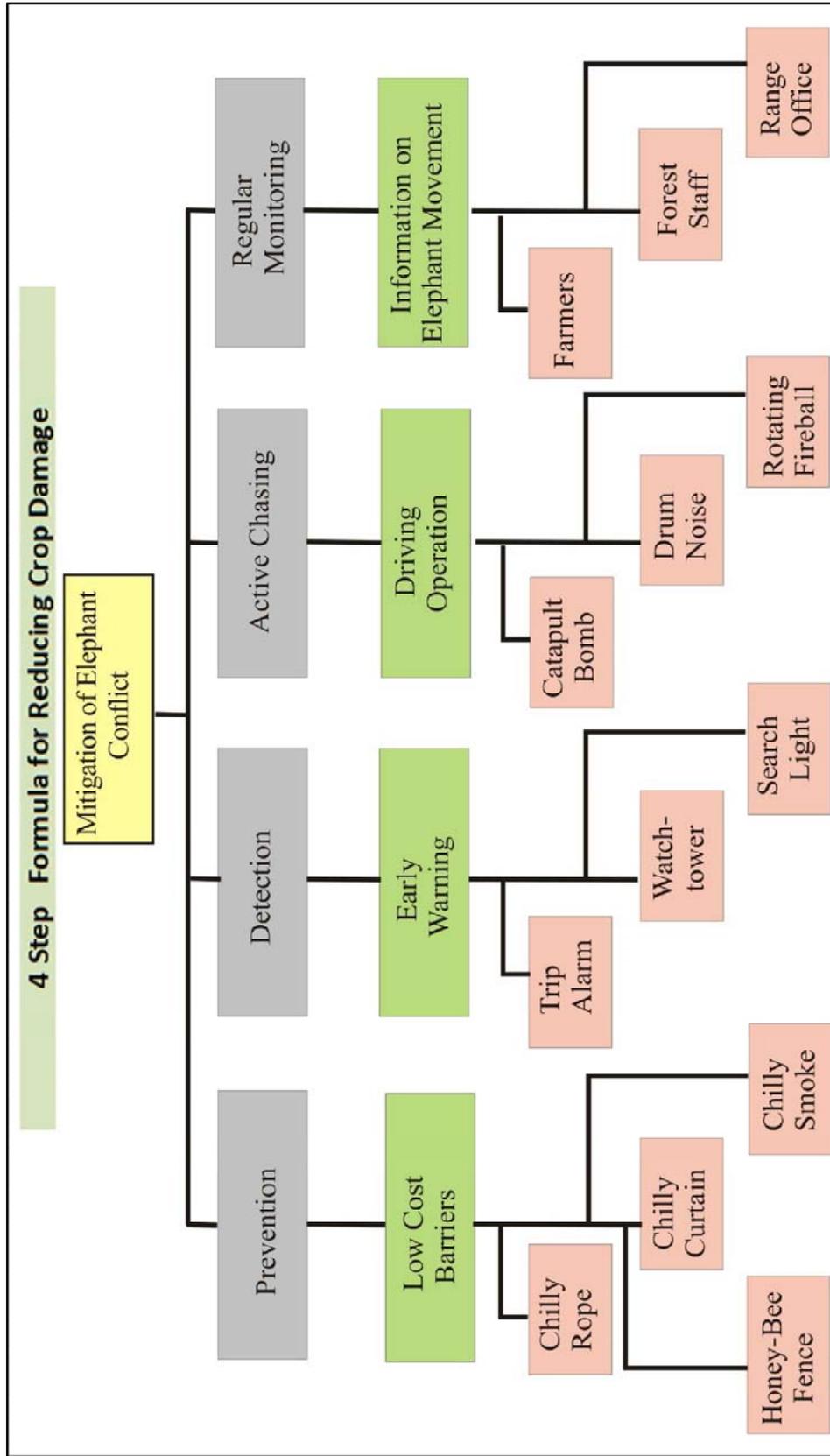


## Why do we need to protect the elephant?

*Ajja* says that the elephants are “gentle giants”. They are one of the largest living land mammals. If we protect their habitats and give them security, they will live happily along with human beings. For centuries, humans have domesticated elephants and we used them in temple, tourism, patrolling and timber industry. They do all difficult work for us in return for food and care we give them. Although majority of us do care for elephants, there are some people who kill elephants for meat, ivory and also because they damage the crops. Many times they get killed while crossing railway lines, roads or get electrocuted. These are the reasons why elephant numbers are declining in the world.

In spite of all this, India is still having the largest population of elephants in entire Asia! The main reason for this is that our culture teaches us to respect all living beings and we love our elephants as they are an incarnation of *Ganesha*. Elephants have a life span of 60 to 80 years and are just like our parents and grandparents for us. The calves we see in the forest today will live for 70-80 years more and our grandchildren will be able to see them. Wild elephants add to the prestige of our nation and to our state. And remember, ivory looks best on elephants so let us try to protect our elephants today for all our tomorrows.





## What to do when....

*Ajja* gave me a list of *actions* that the farmers could take to reduce crop damage in their fields.

### Before Crop-raiding season

- ▶ All farmers in the affected village should come together and form a Crop-Protection Committee in the village.
- ▶ Identify main entry points from where the elephants enter the village.
- ▶ Select suitable trees in near-by farms for making tree-watchtowers.
- ▶ Construct sturdy and comfortable tree-watchtowers that has a mattress, mosquito net and lanterns.
- ▶ .All farmers having farms on the periphery of the village must have watch – towers and should carry out night guarding.
- ▶ Keep phone number of all farmers and local field staff ready for contacting during emergency.
- ▶ If possible, keep few teams for night guarding and a few teams for driving operations and rotate the teams every alternate days. This way responsibility will be shared between people and everyone will get some rest.
- ▶ Keep materials ready for trip alarm, chilly rope, chilly curtains and chilly smoke. Buy Ever-ready torch, firecracker bomb and catapults

### During Crop-raiding Season

- ▶ Install trip alarm on the boundary of the forest.
- ▶ Install chilly rope, chilly curtain, and chilly smoke on the farm boundary.
- ▶ If you get information about presence of elephants near your village, inform other villagers and field staff.
- ▶ If you see elephants in your farm, first contact the chasing team and field staff on their mobile phone.
- ▶ Till the time help arrives, you can locate the elephants with torch-light and start chasing them with catapult bomb and rotating fire ball etc.
- ▶ If your crops are damaged, apply for compensation.
- ▶ If you want to prevent crop damage, start practicing night guarding and adopting these mitigation measures and monitor elephant movement in your area.

## What can we do to conserve elephants?

### PLEASE DO THIS

Elephant is our National Heritage Animal. It is our duty to protect it.

If we guard the crops regularly, it is easy to prevent crop damage.

We should apply for crop compensation when crops are damaged as the Forest Department offers compensation for the damaged crops. Some of our losses can be compensated with this amount.

Keep the electric lines away from waterholes as they may accidentally fall in the water and kill elephants/or other wildlife coming to drink water.

If you see any abandon calf or injured elephant in the forest or road, please inform the Forest Department.

Help in monitoring elephant movement and give regular information to Field Staff about elephants in your area. This will help in alerting the farmers.

### PLEASE DO NOT DO THIS

Do not poison, shoot or electrocute the elephants.

Do not tease or throw stones at elephants.

Do not offer food to wild elephants or worship them. Wild elephants are not habituated to human beings and may charge out of self-defense.

Female elephants with young ones are very protective of their calves so maintain safe distance from them.

Tuskers are aggressive in nature. Do not go close to them. They can run faster than you can imagine!

Elephants can smell the air with their trunk. When you are near the elephants, keep away from the wind direction so that they do not detect your presence.

Do not destroy the trees, bamboo and grass in the forests as these are the natural food items of the elephants.

Do not set fire in the forests as it harms trees and animals.

## Some Important Information

### How to Fill in the Application for Crop Damage by Elephants

- First thing is to inform the forest guard about crop damage in your farm.
- Write a simple application for crop damage as shown in the appendix. The application should have details on farmer's name, address, location, date of crop damage and your assessment of crop loss. Please see the attached format on page 29.
- Attach the following documents with your application.
  - RTC land record from tehsil office of your farm
  - A photograph of the crop damage in the field along with the farmer
- Submit this application to the Range Office.

### How your application gets processed

- After receiving your application, the forester or guards will visit your farm and assess the area damaged. Till then do not clear the damaged area.
- They will prepare a *panchnama*.
- They will attach his report to your application and forward it to Assistant Conservator of Forests (CF) and then to Divisional Conservator of Forest (DCF) for approval.
- The DCF will assess the application and sanction the amount for compensation.
- The approved amount will be delivered to you by cheque.
- The entire procedure can take about 5 to 6 months.
- Ex-gratia payment rates for Crop Damage by elephants from June 2009 is provided

Crop	Rate/ quintal (In Rs)
Paddy	660
Maize	620
Jowar	620
Ragi or Finger Millet	600
Sugarcane	81.18
Cotton	1985
Coconut/ Areca	200 per plant (< 5 yr), 400 (7 to 9 yrs), 1000 (> 10 yrs)
Banana	80 per plant

**Simple Format for Application form for filing in Crop Damage by Elephants**

Date: \_\_\_\_\_

Dear Sir,

I (Name of applicant) \_\_\_\_\_ from  
Village \_\_\_\_\_ located in Range \_\_\_\_\_  
wish to apply for compensation for Crop Damage by elephants in my field. Please find  
the details below:

Name of the Land owner	
Address of Residence	
Address of Farm with survey number	
Date of Crop Damage	
Names of Crops Damaged and their quantity	

Yours sincerely

-----

Signature of the Applicant

Date:

### How to fill the application for obtaining subsidy for other crops

The Horticulture Department and the Forest Department offers subsidy on certain species which can be grown in your farm. These alternate crops can offer protection against elephants and can also help in generating additional income.

Keep the following documents ready for availing the subsidy from the horticulture department.

- RTC land record from tehsil office
- Form 8 A from Tehsil office
- Your passbook with account number from a Nationalized Bank
- 2 Passport sized photograph of the applicant
- “*Durudikaranpatra*” and *sammati-patra*” from *Gram panchayat* office
- Hand-made map showing boundaries of the adjacent farm. This will be available from tehsil office.
- Self-declaration for availing the subsidy on prescribed format on stamp paper of Rs 20.
- Further information can be obtained from Horticulture Office, Haliyal and Yellapur. 08284-220305 Haliyal-Dharwad Road

**Important contact Numbers**

Sr.No.	Name	Phone number
1	CF Dandeli–Anshi Tiger Reserve	08284 -231585
2	DCF Yellapur	08419-261273/2620787
3	DCF Haliyal	08284-220128
4	RFO Kirwatii	9448140382
5	RFO Yellapur	9448140382
6	RFO Katur	9535509428
7	RFO Manchikere	9845058722
8	RFO Mundgod	9480607189
9	RFO Anshi	9480807625
10	RFO Gund	9480807623
11	RFO Kulgi	9480807621
12	RFO Kumbarwada	9480807624
13	RFO Phansoli	9480807622
14	Dr. Prachi Mehta, Executive Director, WRCS	9011052193
15	Mr. DevidasKaitkar, Field Assistant, WRCS	09480628212

## Notes

---

## Notes

---

## Notes

---



*Elephants have lived longer than humans on the earth,  
In this sense they are the first citizens*

**Published by**



**Wildlife Research and Conservation Society  
Pune**