WILDLIFE HAZARD MANAGEMENT-AN AERODROME PERSPECTIVE

Mr. Ramana Murthy B & Dr. Riju P Wildlife Hazard Management Team GMR Hyderabad International Airport LTD.



DGCA References

Order No. AV-15023/1/2009-AS (NBCC) dated 02.12.2013 b. Revised order dated 20.04.2017

Ministry of Home Affairs Letter No. 53/1/80- Public dated 07.05.1980

Rule 91, Aircraft Rules 1937

Recommendation of NBCC Recommendation of NBCC Air Safety Circular 02 of 2011

Aerodrome Circular 06 of 2017

Ref:- DGCA India-National Aviation Safety Plan 2018-2022

Humility I Entrepreneurship I Teamwork and Relationships I Deliver the Promise I Learning and Inner Excellence I Social Responsibility I Respect for Individual



Safety Measures

National Bird Control Committee

Airfield Environment Management Committees

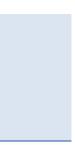
Primary legislation (Aircraft Rules) preventing dumping of garbage and de-skinning of animals within a 10 km radius around airport

Education and outreach programmes Extensive audits and inspections Comprehensive data collection activities

Guidance on Wildlife Hazard Management

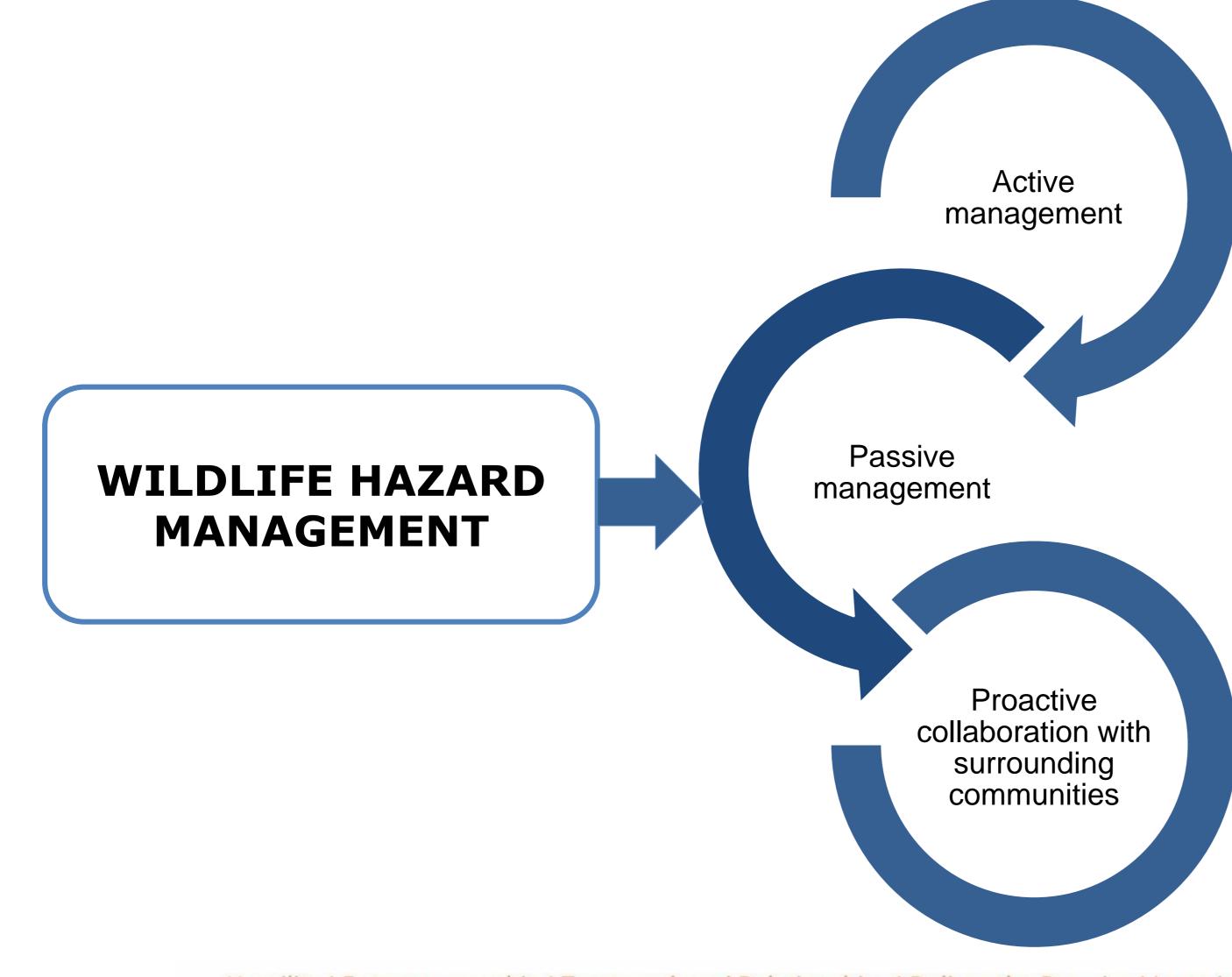








Comprehensive Mitigation Strategies Adopted at HYD Airport GMR



- Crackers- Salute-2, Salute-3, Cotton bombs
- Zon gun/Agri-cannon
- Bird scaring unit
- Bird patrolling
- Dog barking sound
- Pigeon proof net & spike
- Whistling, Flashing of Umbrella, clapping board
- Grass cutting
- **Vegetation Removal**
- Management of water logging areas
- Spraying insecticide and pest control
- Removal of termite mound and ant colonies
- Awareness session for schools and colleges
- Distributing Leaflets and displaying awareness boards.
- Monthly inspection and Timely conduction of AEMC along with line departments









Forest/vegetation removal and uprooting

Rajiv Gandhi International Airport

ZONE 5













Grass cutting

Collection of cut grass

Humility I Entrepreneurship I Teamwork and Relationships I Deliver the Promise I Learning and Inner Excellence I Social Responsibility I Respect for Individual

Passive management





Lifting of grass





Cut and collect













Spraying bird deterrent

Humility I Entrepreneurship I Teamwork and Relationships I Deliver the Promise I Learning and Inner Excellence I Social Responsibility I Respect for Individual

Pest Control





Spraying Insecticide



Trapping and Translocation of wildlife





Wild cat

Humility I Entrepreneurship I Teamwork and Relationships I Deliver the Promise I Learning and Inner Excellence I Social Responsibility I Respect for Individual





Monkey

Pigeon





Scientific approach for effective wildlife control at RGIA

Humility I Entrepreneurship I Teamwork and Relationships I Deliver the Promise I Learning and Inner Excellence I Social Responsibility I Respect for Individual











1. Drain maintenance 2. Termite mound treating with chemical 3. Closing burrows 4. Packing the parts of AOG

Humility I Entrepreneurship I Teamwork and Relationships I Deliver the Promise I Learning and Inner Excellence I Social Responsibility I Respect for Individual







Regular checking and removal of bird nests from critical locations GMR







Humility I Entrepreneurship I Teamwork and Relationships I Deliver the Promise I Learning and Inner Excellence I Social Responsibility I Respect for Individual



Collecting wild mushroom that appear like egg and attracting Raptors GMR



Mushroom in the field

Humility I Entrepreneurship I Teamwork and Relationships I Deliver the Promise I Learning and Inner Excellence I Social Responsibility I Respect for Individual

Collection in progress

Collected mushroom





Caterpillar on runway



Caterpillar on runway

Humility I Entrepreneurship I Teamwork and Relationships I Deliver the Promise I Learning and Inner Excellence I Social Responsibility I Respect for Individual



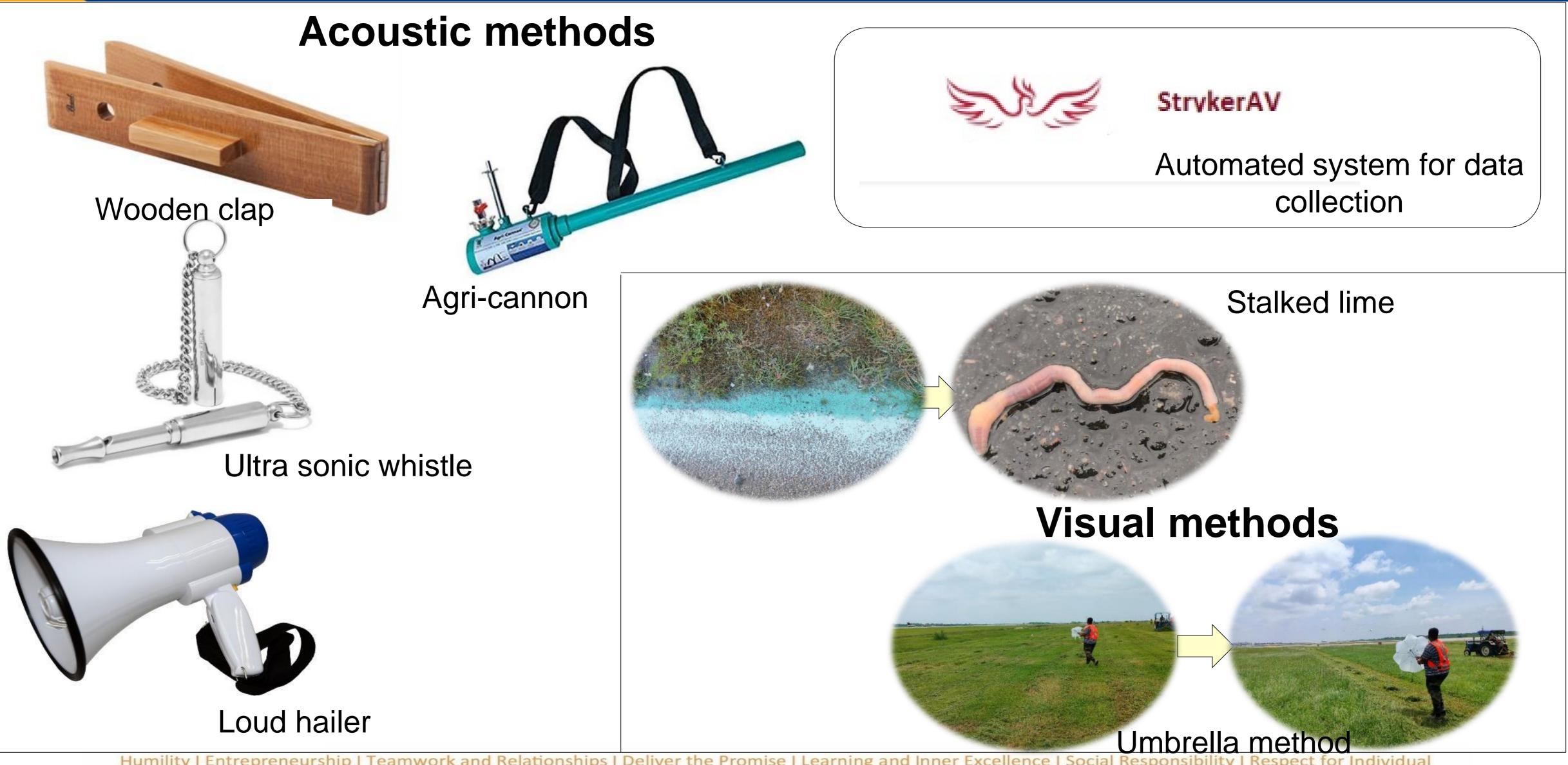
Collection in progress

Collected and removed





New additions to the BASHM tool box



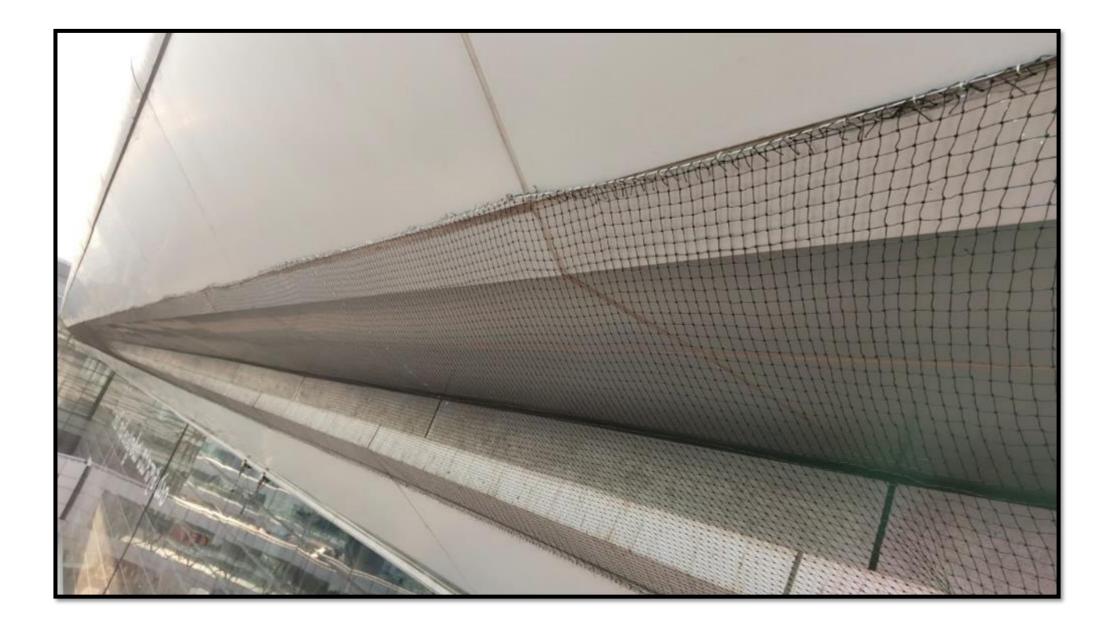






Pigeon proofing

Bird Spike- 5,544 ft./5,544 ft. Bird Netting-58,500Sq.ft./58,500Sq.ft.



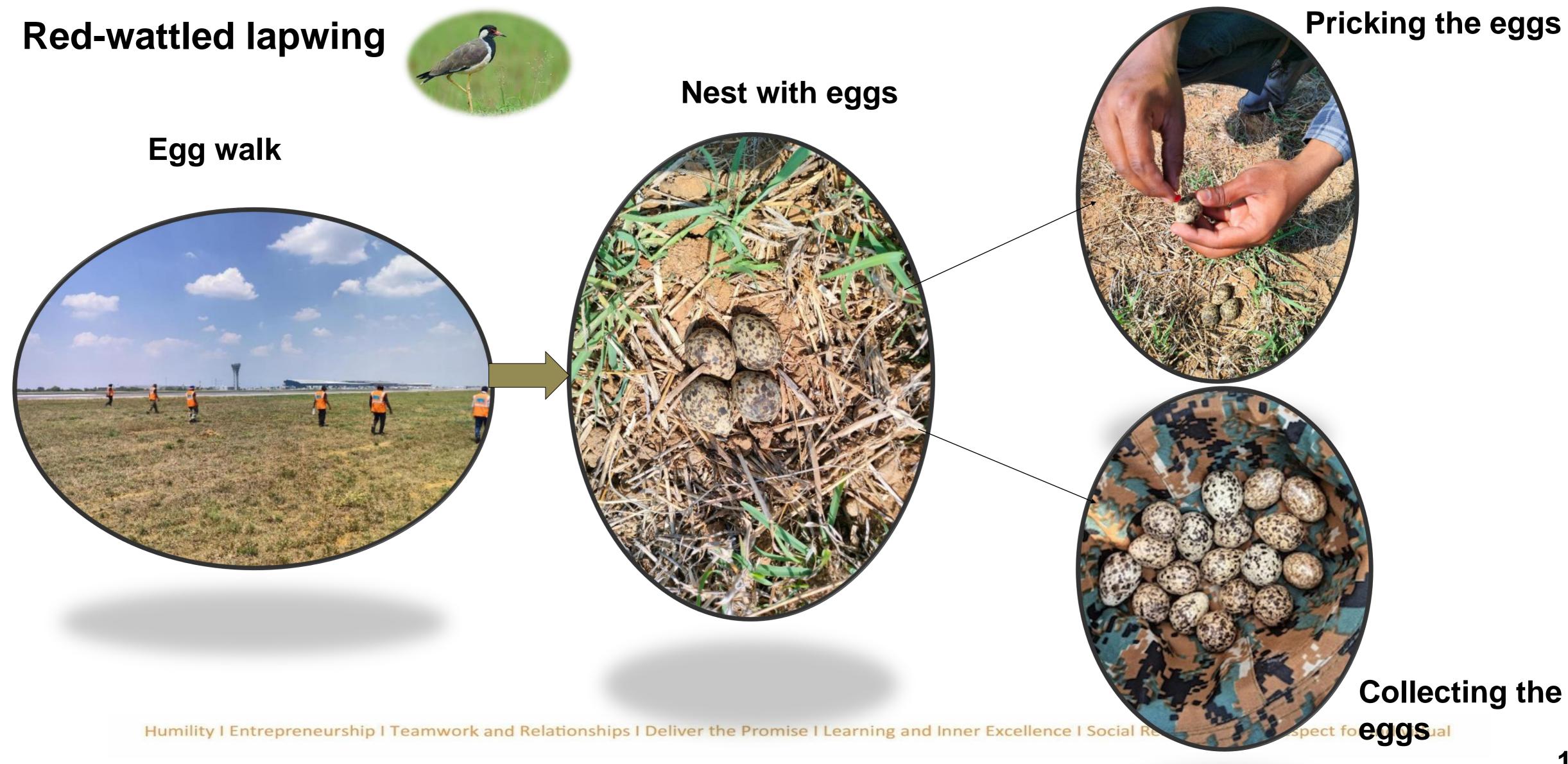








Species specific approaches

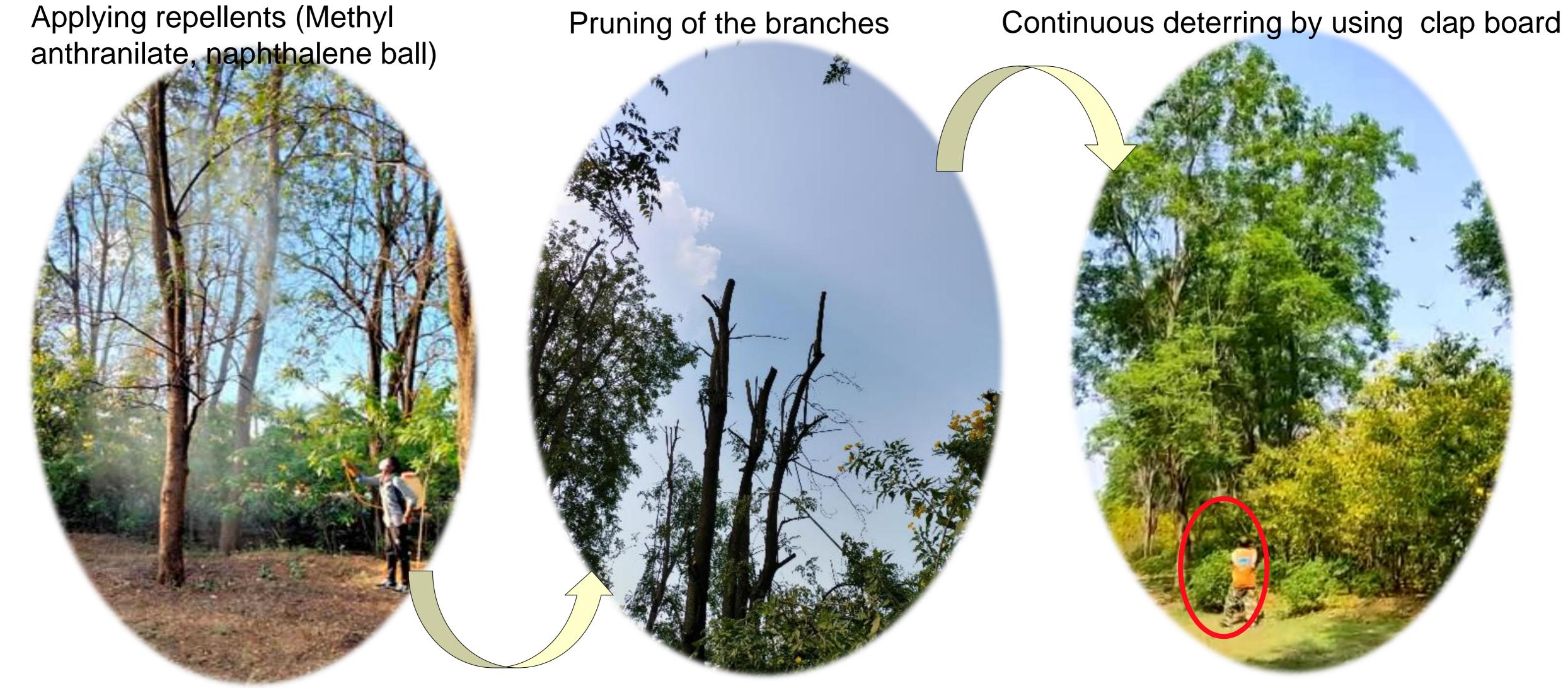








Evacuation of bat roost.





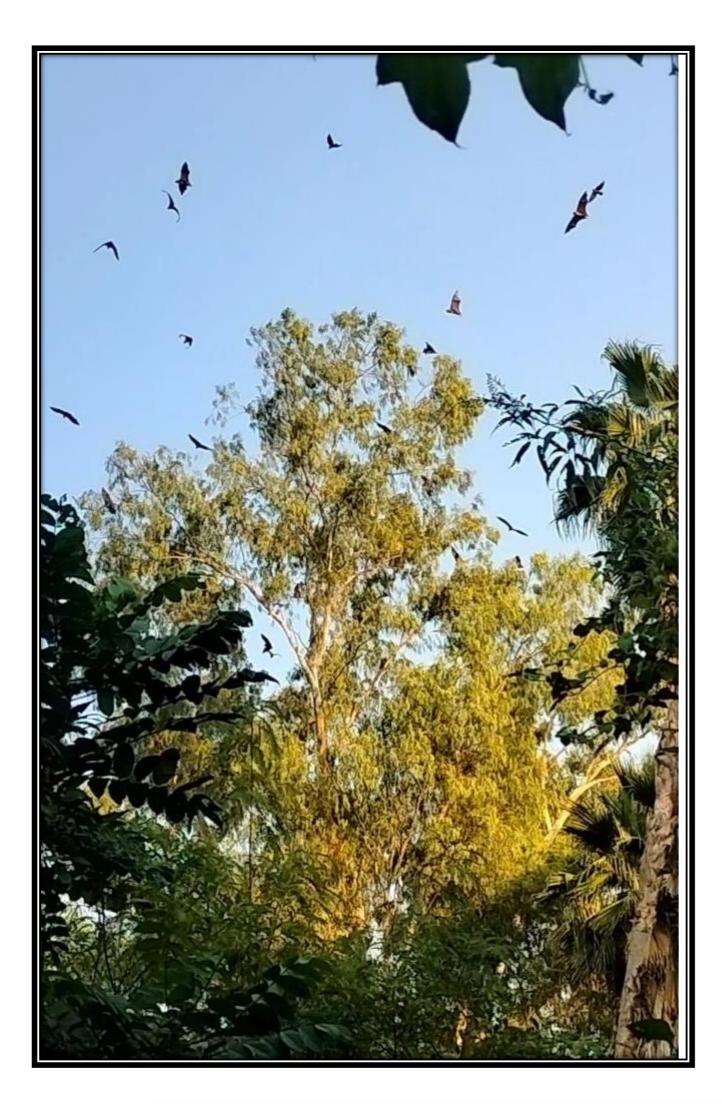


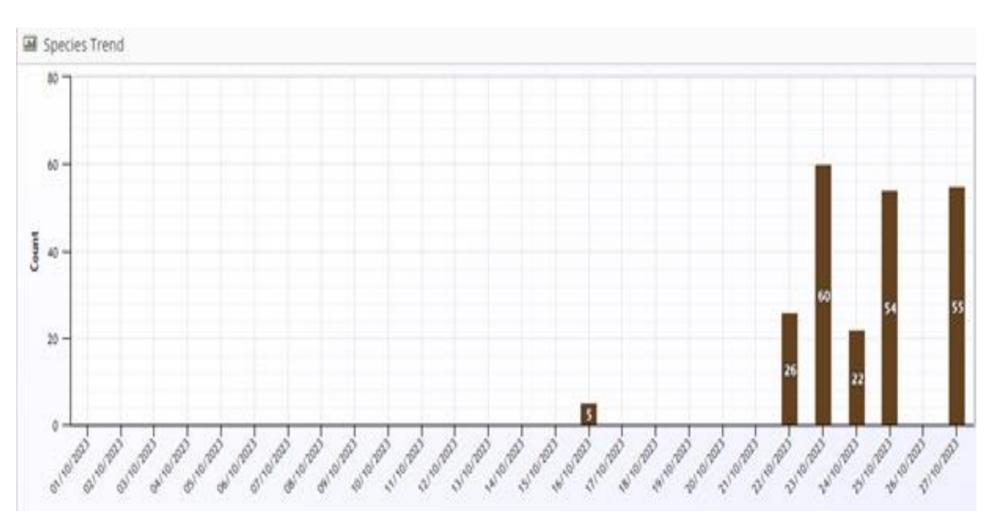






Removing bat roost from critical location



















Rope and stick method



Humility I Entrepreneurship I Teamwork and Relationships I Deliver the Promise I Learning and Inner Excellence I Social Responsibility I Respect for Individual

Peafowl











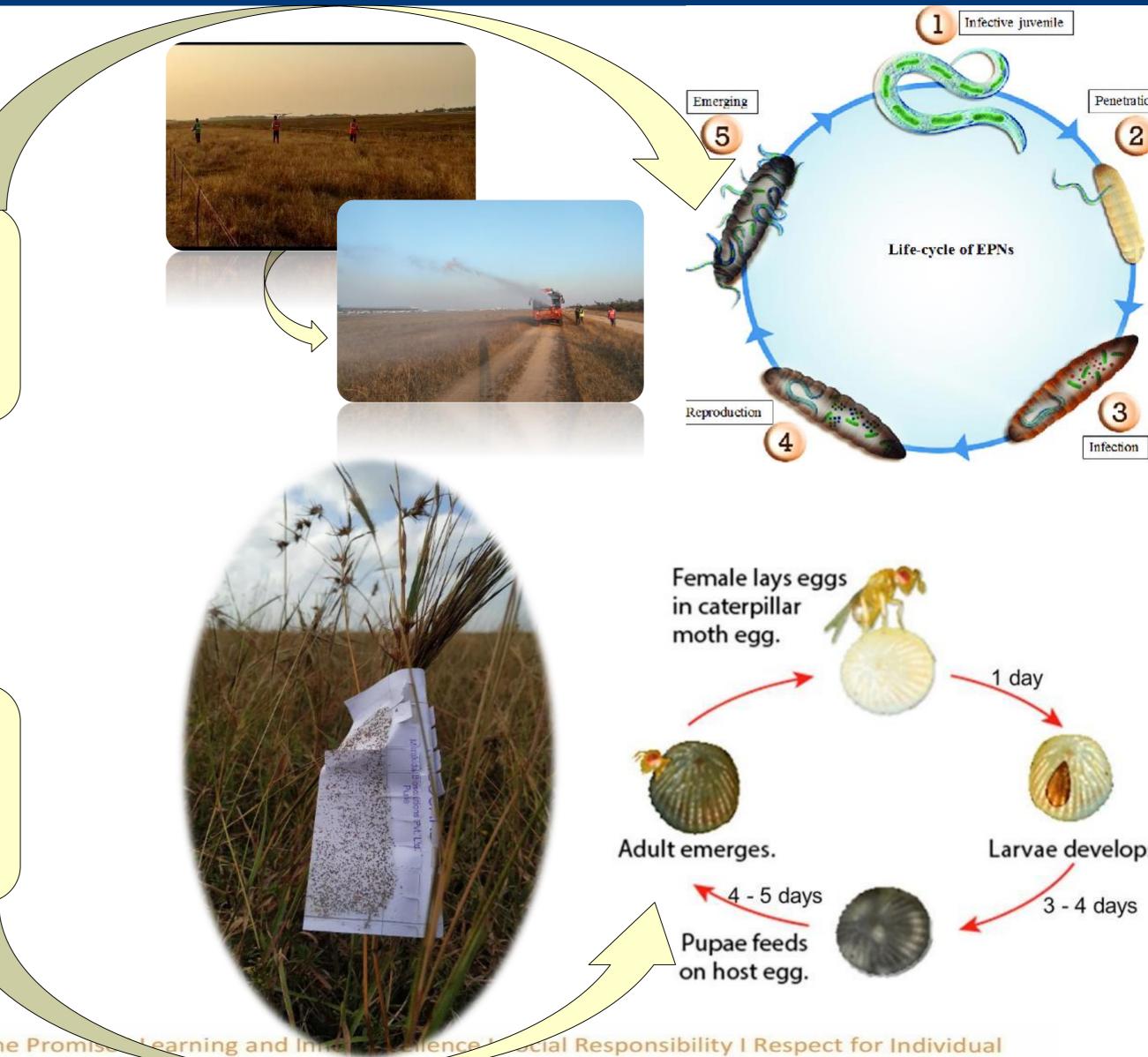
Entamopathogenic Nematode- To reduce the population of orthopteran insect (Grass hoppers)

Trichogramma chilonis- To reduce the population of lepidopteran insects (Butterflies and Moths)

Humility I Entrepreneurship I Teamwork and Relationships I Deliver the Prom

Biological control method to reduce insect population

















Samples of blood stain and feather of unidentified species were collected. The samples were shared with scientific institutes (CCMB/SACON/IISER) for species identification.





Proactive collaboration with surrounding communities

Humility I Entrepreneurship I Teamwork and Relationships I Deliver the Promise I Learning and Inner Excellence I Social Responsibility I Respect for Individual













Monthly AEMC Survey







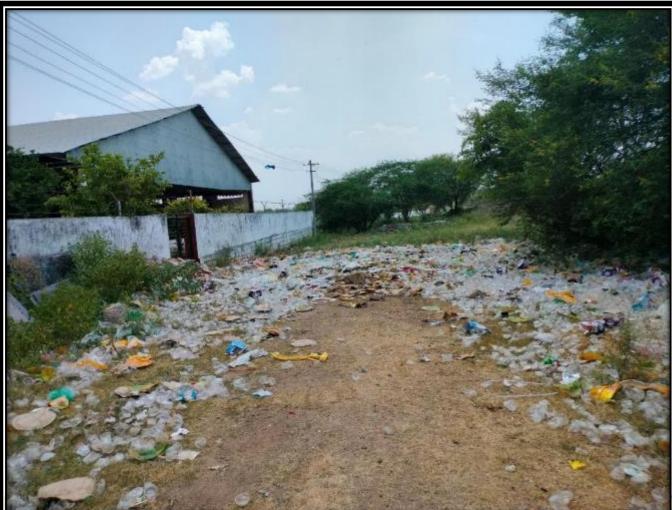






Before





Humility

eliver the Pro



After





ity I Respect for Individual



Survey to assess the status of water bodies











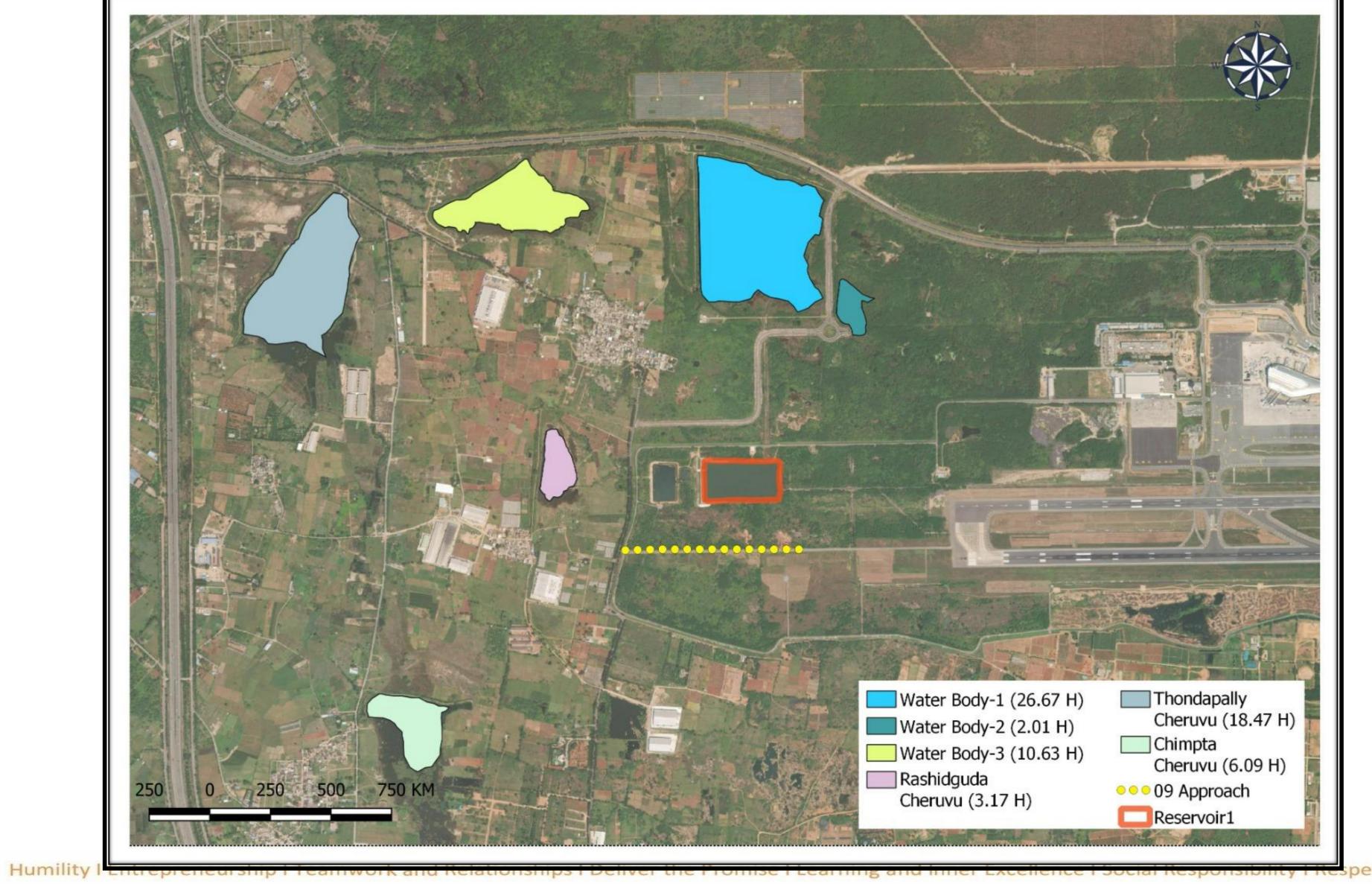








Major water bodies on the 09R approach





onsibility i Respect for Individual



Awareness campaigns by BASHM team















Contd...

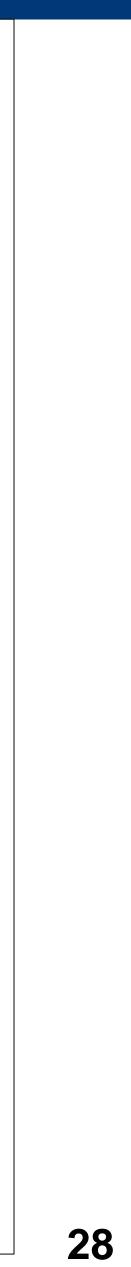












Rewards and Recognitions















THANK YOU







