Enhancement of marine turtles land habitat quality
Guadeloupe archipelago inshore planning

François Korysko(1,2), Eric Delcroix (1,3), Sandra Pedurthe (1,2), Sophie Bédel (1,4), Guilhem Santelli (1,4), Stéphane Guyot (1,5), Didier Lambert (1,5), Marion Brunel(1,3) et Marion Diard (1,6)

(1) Réseau Tortues Marines Guadeloupe
(2) Office National des Forêts
(3) Office National de la Chasse et de la Faune Sauvage
(4) KapNatrel ONG
(5) Conservatoire du Littoral
(6) Ti té ONG

Introduction

- Seaturtles are protected since 1991, and their nesting sites habitats since 2005.
- The littoral is partially managed by ecological managers
- The Recovery Action Plan with a specific program for nesting sites habitats

Management of nesting sites (n=156)
- Ecological manager: 58%
- Other manager: 42%
Strategy for restriction of threats

1 – Diagnosis of nesting sites: identification and quantification of threats (realized)

2 – Determination of priority sites with all stakeholders (in progress)

3 – Realization of actions of recovery (in progress) and/or improvement of legislation (to come)

4 – Realization and transmission of different documents, atlas and technical reports, and awareness documents

Atlas available on website
Ecological land habitats

- Seasonal semideciduous forest on sand soils (volcanic & chalky)
- Mostly degraded by human activities

Unwelcoming site for sea turtles

- Inappropriate lighting of the beaches
- Sand compression made by vehicles
- Equipment located close to the shore
- Large vegetation deterioration (quantity and quality)
Ecological state of «nesting sites»

Main Actions

Inshore management plan = reducing human impact

- Reconstitution of the natural coastal plant cover
- Less erosion, buffer zone between sea and urbanized areas, cooler microclimate & less sun impact (sex-ratio)
Restoring plan cover: regeneration enclosures

Results

2007 2013
Restoring plant cover

Enclosure assessment

- ++ Vegetal cover, forest structure
- -- Enclosure degradation, invasive and/or exotic species to monitor
- ?? Plant diversity
- Scientific monitoring and regulation enforcement
Wooden fences

- Keep turtles from crossing road
- Live posts (*Bursera simaruba, glyceridia sp*)
- Wreathes fence of *Dichrostachys cinerea*

Wooden fences

- Test: 500-meter long fence
- Observation: mortality in fences but strong structure
- Expensive technique though much appreciated for landscape and for traditionnal know how
Complementary works

Reduction of light pollution

Management of vehicle access and parking

Welcoming site for sea turtles

- Car park creation
- Equipment located far from the shore
- Artificial lighting management
- Walking paths
- Regeneration enclosures, to reconstitute the natural coastal plant cover
Complementary actions

- Nesting survey by members of Network
- Technical assistance for coastal managers: more than 10 per year
- Proceedings: 4 in 2012
- Training, information and outreach

Conclusion

- Sea turtles are now better considered in coastal planning
- Development of many projects for the recovery of nesting sites
- Follow up work on light pollution: solutions for each beach
MERCI !

Poursuivons nos efforts!

Photo: Claire Jeuffroy