Bringing back Indigenous Forest:

Re-Aforestation of the Garden Route

Capacitating small scale

CDM A/R Projects

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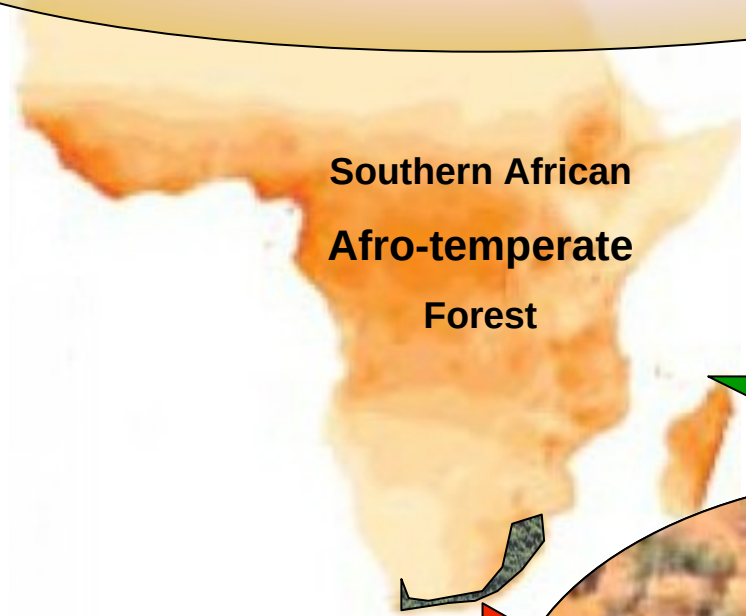
We are tasked to restore

Social and Environmental equity



Loss Of Natural Forest!

Fynbos (Medt. Scrub), Exotics & Timber plantations

Colonialism

Driven by fire & wind

exacerbated by anthropogenic impacts

(e.g. crops, burning for grazing,)

Anthropogenic impacts up to and eventually Enabling industrialisation

We are tasked to restore

Social and Environmental equity

Community

- Socio-economic redress
- Jobs in re-aforestation
- Biodiversity conservation
- Ecosystem services
- Re-import Carbon stocks
- Improved H20 mngmt.

Early humans

Colonialism

Fynbos (Medt. Scrub), Aliens

& Timber manifested

Loss

Of

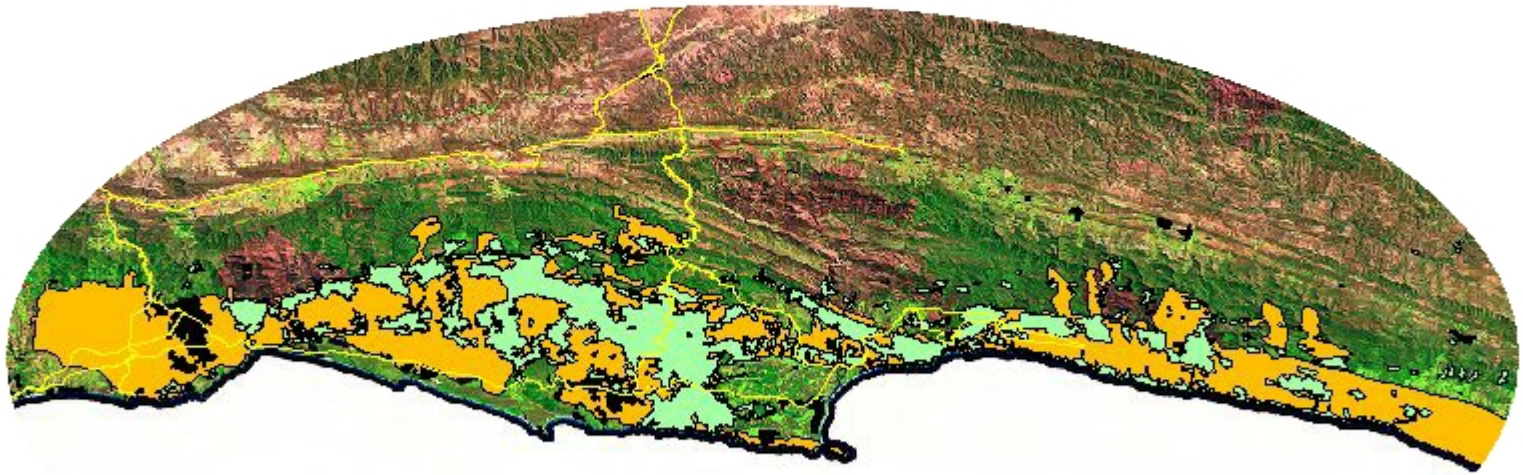
Natural

Forest!

Locally, on the southern Cape Landscape wide scale…

National survey estimated forests at approx. 208 000 ha's

But in fact only 74 200 ha's remain (latest NSBA study)



<u>133 ha's</u> for re-importation of carbon through re-aforestation!!

The Problem

Fynbos and Aliens burn every 5 to 12 years

Set clock back to zero

Increasing:

- **Habitat loss**
- **Substrate compaction**
- **Rampant fires**
- **Flooding**
- **Wholesale carbon export**
- **Regularly!!!**

The Response…

Seedbank, Skills and Re-aforestation nursery

Species	Code	Nr	Plant date	Method	Treatment	Source	1st germ	Last germ	%	Bagged/pot	Size	Moved to

Seedbank!

Typical forest species

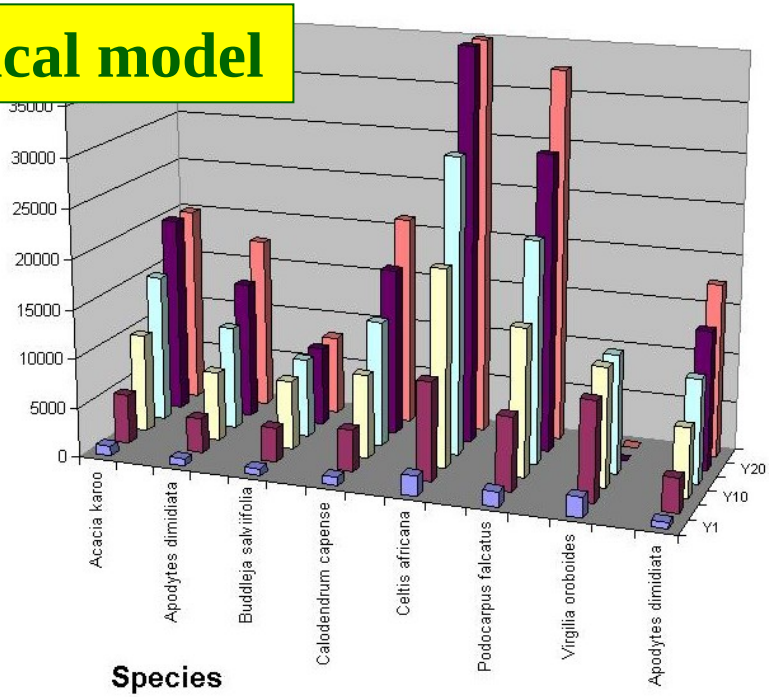
Outeniqua Yellowwood

(Podocarpus falcatus)

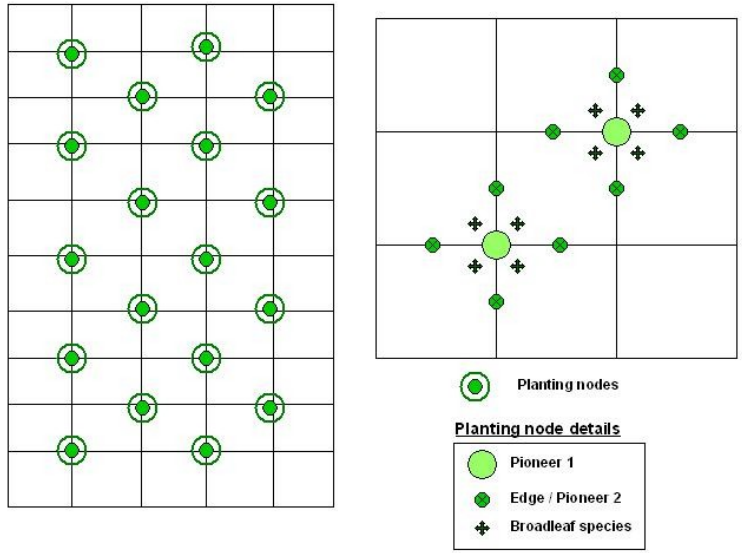
Treatment	Days	% Yield
Hot Water	71	14.5
None	110	14.5
Breach Seed	154	Low
Animal Clean	218	80 +

Data trail from seed origin, treatment, germination, training and planting with a unique co-oordinate address.

A typical model



Forest Hall fine scale planting schedule per quadrant



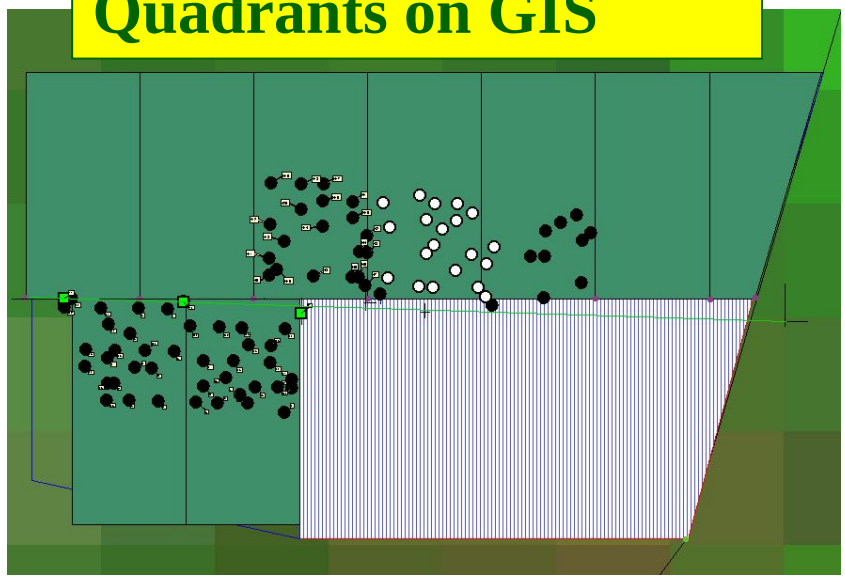
Species Dabase

Quadrant 4

nea (18) as joint pioneers

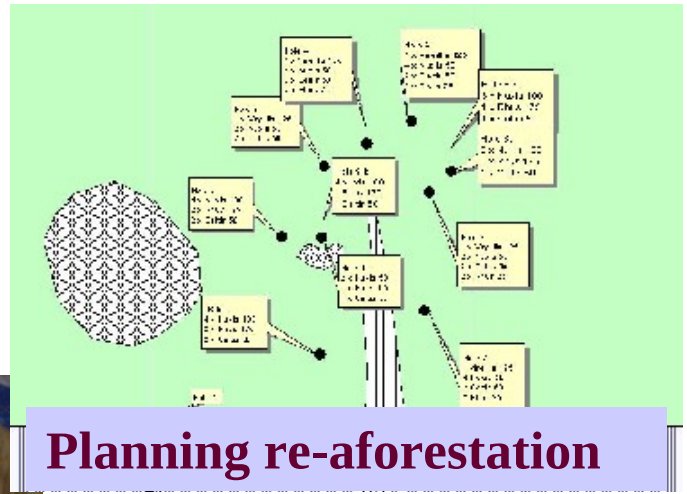
SPECIES	Nr planted	Av hgt cm	Actual average height per year (mm) yr 1	yr 2	yr 3	yr 4	yr 5	yr 10	yr 20
Virgilia oroboides	10	75	2225	4350					
Rapanea melanophleoec	20	125	2230	4325					
Podocarpus falcatus	20	50	1075	2175					
Celtis africana	20	50	1060	2120					
Buddleja salviifolia	10	125	2200	4300					
Rhus chirindensis	20	25	1050	2073					
A	0	0							
A	4	0							

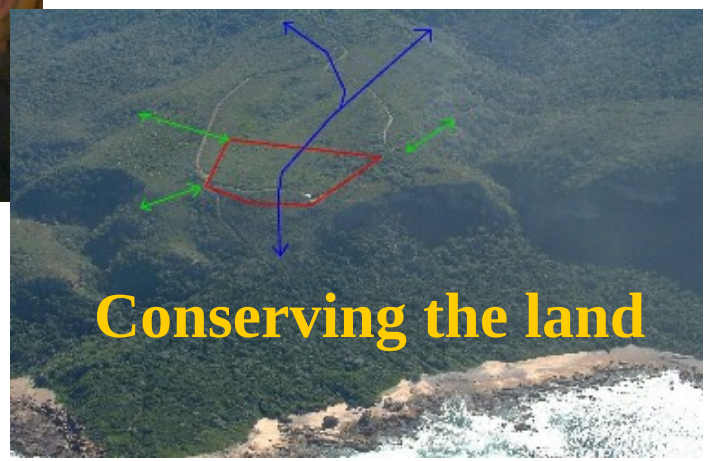
Quadrants on GIS



Development of Learning Center

Science of re-aforestation





Community Project - Kurland

TYPE	SIZE Ha	STATUS	LAND TENURE
Local AR (of degraded land through tree planting, asst natural regeneration)	80 Ha	Pilot project (Cur: 2 yrs +)	Private Ownership (Self Funded)





- Researched local socio economic history
- Researched and implemented rapid Re-Aforestation
- Developed economic models and
- Developed Community participation and discourse

Next Phase (Local Communities)

TYPE	SIZE Ha	STATUS	LAND TENURE
 Landscape wide AR	Replicable Multiple 8000	 Neg, Planning stage	Public Private Partnerships District Authorities, Land Affairs, NP's

Barriers to development:

Restrictive CDMs - Low pricing of CER's - Insensitivity to Africa

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The End