



The Macolline Project



-A view of deforestation in eastern Madagascar.

Macolline, **C.A.L.A.** and **JHA FUND** are a consortium of NGOs working together towards reforestation and *silviculture in Antalaha, Madagascar. **The outcome:** to relieve poverty and advance education by providing environmental education programs to underprivileged village communities and local students.

The **APM** Institute -Association for Protection of <u>Macolline (Botanical Trail)</u>, was originally established for the reintegration of local former recovered leprosy patients. Over time, Macolline has become a "forest for education" as well as a restoration project.

The **C.A.L.A.** Association consists of leprosy survivors that help manage the Macolline Botanical Trail, giving work to the physically challenged victims at the same time as assimilating them back into the social and economic life of the region. **Comité d'Aide aux Lépreux d'Antalaha**



-Tree nursery managed by C.A.L.A. leprosy survivors and their families.

JHA FUND's mission is to raise awareness, facilitate and educate as many teachers and students as possible about conservation, nature and reforestation by using Macolline as a learning tool along with our **ecopedagogy educators/guides. Macolline, as well being an adventure botanical trail, manages the largest collection of trees and plants in Antalaha and is engaged in local initiatives to promote green projects.

Macolline, founded by **Marie-Hélène Kam Hyo** in 2001, is a 25 acre primary forest in a region of Northeastern Madagascar located 3km north of the town of Antalaha on a hill of 10 hectares. This area of Madagascar is considered a biodiversity hotspot. To qualify as a hotspot, a region must meet two strict criteria: it must contain at least 1,500 species of vascular plants (> 0.5 percent of the world's total) as endemics, and it has to have lost at least 70 percent of its original habitat. National and international mobilization is required to assist the nature while respecting the environment. Among the sites of the World Heritage list of UNESCO, the forest north of the country is a top priority for conservation.



-Children of the CALA village planting flamboyant trees. ~Delonix Regia

- * Silviculture: is the practice of controlling the establishment, growth, composition, health, and quality of forests to meet diverse needs and values. The name comes from the Latin silvi- (forest) + culture (as in growing).
- ** Ecopedagogy: is a discourse, a movement, and an approach to education that has emerged from leftist educators in Central and South America that seeks to re-educate "planetary citizens" to care for, respect and take action for all life.



-Josiane of the CALA village, collecting clove seeds.

Current activities at MACOLLINE

- Maintain daily work for former C.A.L.A. leprosy patients with physical disabilities, as well as their families
- Several reforestation projects throughout Antalaha and surrounding areas. In total, we have planted over 185,000 trees, including fruit trees, fast growing trees for charcoal, native hardwood trees, etc... *
- School visits with local eco-guides. Over 1500 students and young adults have visited from January 2014 to date, including 17 schools in the SAVA region, members of the local church, boy scouts and English environmental clubs such as GIDA, KEEN and EARS (see chart below)
- Provide work to the village women by buying handicrafts to sell at the MACOLLINE/CALA shop in the town of Antalaha
- Currently completing tree and herbaceous plant inventory in order to follow the evolution of nature in the protected Macolline reserve. Last inventory taken was in 2014
- Member of The Sustainable Tourism Program of Madagascar since November 2014
- Supply access to a battery recycling program
- Part of the United Nations World Tourism Day in 2014
- Macolline is listed on <u>TripAdvisor.com</u> and has websites available in , <u>English</u>, <u>French and many other languages</u>

ESTIMATED BODGET (Cost per student)

According to our calculations, we need \$9 (27 900 Ariary) per entry, per student. This cost includes:

- Site maintenance 33,466,800 + 7,500,000 + 5,880,000 + 97,000 = 46,943,800 Ariary
- Transport for groups of students to and from the site (petrol and drivers) 9,263,430 Ariary
- Teachers and local guides 34,800,000 Ariary
- Educational take-home booklets 15,000,000 Ariary
- Presentation of a documentary film to conclude the day's events 1,500,000 Ariary
- Regular monitoring using educational tools to provide students with a follow up. Eco-guides visiting schools for ongoing awareness. Communications and office expenses. 3,700,000 Ariary
- Rent 3,800,000 Ariary
- Bank charges 200,000 Ariary

N.B. There are at least 30,000 students in the town of Antalaha. The goal is to educate a minimum of 2000 - 3000 students per year. **Our annual budget is** 115,207,230 Ariary (approximately US\$38,000).

Estimated total yearly budget	<u>Ariary</u>	<u>US\$</u>
Salaries (permanent and part time)	33,466,800	11,155.00
Property maintenance and repairs	7,500,000	2,500.00
Fringe benefits	5,880,000	1,960.00
Cnaps (social security)	97,000	33.00
Logistic expenses (petrol, drivers, maintenance, canoes)	9,263,430	3,088.00
Salaries of permanent environmental guides	34,800,000	11,600.00
Take-home educational booklets	15,000,000	5,000.00
Film documentary	1,500,000	500.00
Office expenses	3,700,000	1,194.00
Rent	3,800,000	1,233.00
Bank charges	200,000	67.00
Total	115,207,230	\$38,330.00

Partnering with us can mean anything from a onetime sponsorship to a long-term commitment. Donors in the US and CANADA can make tax-deductible gifts to **CHARITIES AID FOUNDATION (CAF)** with **Macolline** as the grant recipient. (more info to follow)

Environmental educational visits to Macolline 2015-present

<mark>2015</mark>			
<u>Date</u>	<u>School</u>	# students	# teachers
01-Feb	Scouts	32	6
07-Feb	Keen's Club	17	1
07-Mar	St. Jean & Lycée	49	1
31-Mar	Lycée d'Andapa	12	2
01-Apr	Group Biblic Secondaire	65	2
18-Apr	Bambino	40	1
01-May	GIDA	14	1
23-May	St. Jean	38	1
24-Nov	Chan Koch Phan	82	5
30-Nov	FJKM	224	5
04-Dec	La Reussite	39	3
16-Dec	EPP Ankolabe	37	2
	<u>TOTAL</u>	<u>649</u>	<u>30</u>
<mark>2016</mark>			
<u>Date</u>	<u>School</u>	# students	# teachers
13-Feb	Lycee Horace Francois	66	1
20-Feb	Boy Scouts	16	1
20-Feb	Ecco Homo	71	8
24-Apr	KEEN CLUB	13	1
06-May	Lycee Sambava	19	2
20-Oct	EPP Rue de Marseille	94	1
21-Oct	EPP Andampisoa	23	1
03-Nov	EPP Ambatomitraka	172	2
09-Nov	EPP Ambondrona	86	1
10-Nov	EPP Ambondrona	74	1
01-Dec	Ecole Francaise	32	3
16-Dec	EP Espoir	16	2
	<u>TOTAL</u>	<u>682</u>	<u>24</u>
2017			
<u>Date</u>	<u>School</u>	# of students	# of teachers
13-Feb	EPP Ambondrona	135	3
18-Feb	EPP Ankolabe	114	1
25-Feb	EPP Taratra Tanambao	118	2



Rado works in development and education at Macolline. Here, he is explaining the different varieties of vanilla to elementary school students.





Currently, the site is visited by classes from primary schools to University level, followed by tree planting. We believe that students and teachers are the key to preserving the unique environment of Madagascar. The objective of the Interpretation Center at the entrance of Macolline is to host classes and students and provide awareness days for the protection of nature. Teachers will adapt their teaching approach to the various age groups, with as many local students visiting as possible. Our eco-guides have received MAD'ERE Kit training, Madagascar National Park training, and have completed GIDA courses (Independent Guides of Antalaha with diplomas), all of which play an important role in the education of Malagasy students at Macolline. Today, the association wants to expand its mission of natural biotope protection by creating more awareness days for as many school groups as financially possible.



Madagascar is a victim of traditional agricultural practices like "tavy" (slash and burn) which has resulted in major deforestation all around the island. To remedy this situation, it is appropriate to inform the region's youth.

Macolline strives for reforestation with native species grouping different endemic species, according to UNESCO conservation priorities. Tens of thousands of trees have been planted, including over 600 species of precious and semi-precious wood native trees, fruit trees and fast growing trees. Macolline has been participating for more than 12 years in the fight against deforestation in the Antalaha area. Precious woods sometimes take centuries to reach their maximum size, making the looting of highly threatened species highly unsustainable. Today it is illegal to chop down or to export these precious woods which include rosewood, palissandre, ebony etc.... Unfortunately, illegal logging is still one of the major environmental problems of our region.

We fight against the disappearance of precious species by implementing forestry practices to create employment and a source of income while protecting the forest. Macolline also produces seeds to reforest these trees. Nearby Macolline, we have also developed new forests by planting fast growing species that will be used for "green coal". For example, a 25 year old forest has been planted with 4 waves of planting: In the first wave in 1992, 300 villagers began planting Filao trees on a total area of almost 40 acres.





There have been consistent additional plantings from 2008 to today. The objective, to meet the demand for coal, is to achieve reforestation continuity in order to avoid constant reduction of the natural forests of the region. 85% of households in the region use charcoal, and adaptable exotic tree species can fulfill the need for fuel. Filao (Casuarina equisetifolia) for example, is a fast growing tree, usually 1m-10m in 2 years. This a perfect green coal alternative which is a daily need of the population.



The Macolline Project includes counselling and continuous monitoring of students of all ages in the region of Antalaha using activities such as workshops and training programs related to conservation and reforestation. Macolline and its educators aim to increase the local awareness of individuals and communities to manage their natural resources. Our main objective is to become an environmental education resource center where teachers and students can enrich their botanical and environmental knowledge. We trust that by combining this, with exposure to the actual work done in the tree nurseries, is the best approach to address environmental education.





Macolline is a forest that serves as an **awareness tool for the protection of biodiversity**. Our education activities, programs and resources have been developed to provide an integrated approach to environmental education in the SAVA region. Conservation efforts are not sustainable unless undertaken in collaboration with educational initiatives. **Youth awareness and involvement in the future of the planet**, and in particular Madagascar, is the only way to meet the environmental challenges of the coming decades.



Macolline from above

Donors in the US and CANADA are now able to make taxdeductible gifts to **CHARITIES AID FOUNDATION (CAF)** with **MACOLLINE** as the grant recipient. *

 $\frac{https://cafa.iphiview.com/cafa/Organizations/OrganizationView/tabid/437/dispatch/byorganization~id\$182437~h}{ash\$c1059cec791b54d17864bfedc73c34f92439d3ff/Default.aspx}$

*If you donate \$500 or more, you may request a tax deductible donor form



*Locations of reforestation: Belfort village < 30,000; Jules village < 20,000; Waterfront of Antalaha > 5000 (half have disappeared due to a tidal wave in 2012); Tree nursery Macolline > 200,000; Experimental forest to create green coal > 25,000; Antalaha Youth Center > 150; Cap Est > 500; Ambodikakazo > 200 and Manambato > 5000.



ASSOCIATION DE PROTECTION DE MACOLLINE (APM)

LOT 45 K, RUE DE TANANARIVE -TANAMBAO 206 ANTALAHA, MADAGASCAR macolline.madagascar@gmail.com +261 32 07 161 01 / +261 32 55 127 71

DIRECT DEPOSIT BANK INFORMATION: BNI MADAGASCAR IBAN: MG46 00005 000014 315 380 9 02 00 68

<u>OK</u>

Donations via Paypal can also be made by visiting www.macolline.org or www.jhafund.com