## THE SOCIAL ROLE OF FORESTS: **FOOD**

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## OUTLINE OF PRESENTATION

- 1. "FORESTS": ?, & biodiversity, Food
- 2. FOOD FROM FORESTS: ?, & dynamics
- 3. CHALLENGES of forest foods
- 4. FOOD FOR THOUGHT

# 1. "FORESTS: ?"

- what is a "forest" (for FAO): FRA
- 30% of earth's terrestrial surface (4 billion ha) (1/3 "primary" forests ! Deforest/degrad)
  460 m. ha designated for cons. of biodiversity
- lion share of animal & plant species (majority with still unknown (food) potential –tropical species)
- livelihood support (to approx. 300 million to 1 billion people) (80% of forests are public owned)

## FAO definition of a "Forest"

 Land spanning more than 0.5 hectares with trees higher than 5 meters and a canopy cover of more than 10 percent, or trees able to reach these thresholds *in situ*.

It does not include land that is predominantly under agricultural or urban land use

#### 2. FOOD FROM FORESTS: ?

- FOODS: nuts, fruits, mushrooms, bushmeat, edible insects, leaves, roots and tubers, honey / and used for food, spices, colorants, medicinals, herbs, fodder for livestock,.....
- Non-Wood Forest Products, NTFP's, emerging-, underutilized-, uncultivated, indigenous-crops,...
- NWFP Global reported removal value: US\$ 18.5 billion (underestimation) (eq. value of global apple production (FAOSTAT)

# 2. FOOD FROM FORESTS: characteristics & dynamics

- most farmed species <u>originated</u> from forests and have their origin still wild growing in the forests: f.ex.: apple, coffee, tea, ananas,....
  - importance of "wild" species for <u>genetic improvement</u> of farmed species
  - "<u>domestication</u>" process still ongoing ! (particularly of tropical species) *Macademia nuts, Theobroma grandiflora,...*
- <u>direct</u> food contribution + provides <u>diversity</u> in diets (proteins: bushmeat, edible insects, fish,../vitamins: fruits, leaves,../ fats: nuts,...)
- Forests and trees provide <u>indirect</u> protection of farmland & water supplies

#### 3. FOOD FROM FORESTS: Major challenges

- majority produced from gathering/hunting on "public"owned lands ("tragedy of commons" - leads to species depletion (large fauna spp./flora: medicinal plants)
- **conflicts among forest user stake holders**: "timber versus food" (ex.: sapelli wood versus edible caterpillars: logging companies versus indigenous peoples)
- fragmentation of NWFP production, + local importance
- poor institutional, legal, policy and regulamentory framework (most of production/sector is "informal" and for subsistence use)
- low technological level and limited value added by producers
- indigenous knowledge and practices are disappearing (deforestation, rural exodus, changing food habits,....)

# 4. FOOD FOR THOUGHT

- need for <u>awareness</u> raising (Forestry depart. : "Forests are more then just wood" !)
- need for <u>cross-sectorial approach</u> when developing edible NWFP (involvement of Forestry, Agriculture, Nutrition, Health, Trade,...)
- improve/ adjust <u>technical skills</u> and indigenous knowledge base (incl. nutritional data of forest foods)
- adjust policy/ legal/ regulamentary frameworks governing production and trade of forest foods with a more "pro poor" focus

#### Activities by FAO Forestry Deprt.

- <u>awareness</u> raising on the contribution of forests to food security (direct + indirect)
- improving <u>technical knowledge</u> on major edible NWFP (honey, mushrooms, edible insects, nuts, ...) and topics (domestication, assessment, adding more value, enterprise development,...)
- support to <u>institutional capacity</u> of member country's forestry agencies, curriculum devel
- improving related Policy and regulamentory framework
- technical assistance (<u>field projects</u>)