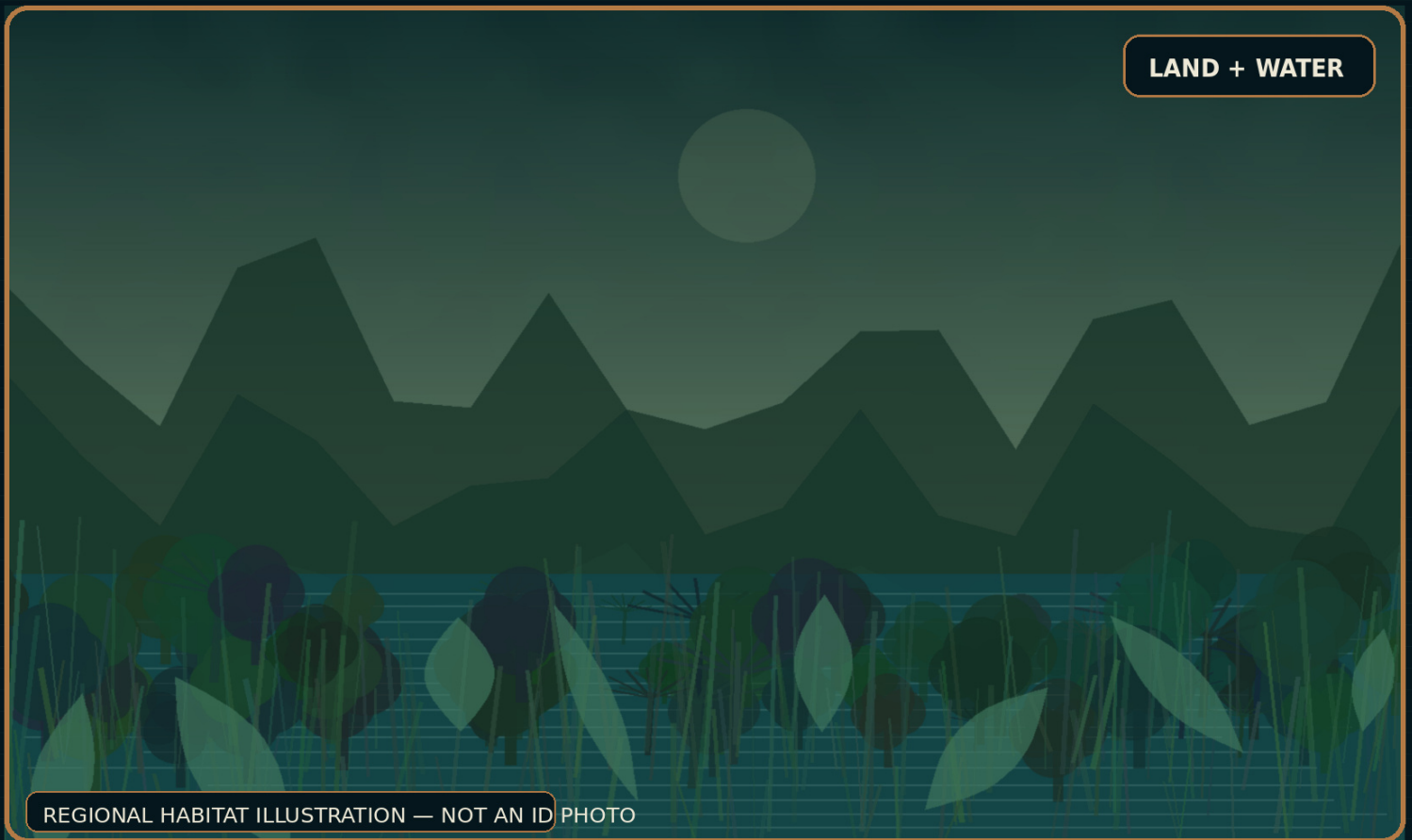


NORTHERN ANDES CLOUD FOREST PLANT SURVIVAL GUIDE

South America • USDA-EQUIVALENT ZONES 8-11 • KÖPPEN Cfb / Cwb



USEFUL

EDIBLE

MEDICINAL

POISONOUS

IDENTIFY • EAT • BUILD • HEAL • AVOID

Illustrations show habitat and form; verify every plant with current regional photographs and expert sources.

REGION AT A GLANCE

A continental bioclimatic region, not a destination or a promise that every listed plant occurs at every site.



Continent: South America USDA-equivalent hardiness: 8-11 Köppen: Cfb / Cwb

Regional habitat: Andean cloud forest, ravine, pasture edge and bamboo thicket

Zone warning: hardiness describes winter minimum temperature only; rainfall, heat, soils, fire, elevation and seasonality still control the flora.

FIELD PRIORITIES

- In species-rich forest, require flower, fruit or several vegetative traits; leaf shape alone is almost never enough.
- Match at least three independent traits and rule out every dangerous look-alike before harvest.
- Treat water plants as both botanical and water-quality decisions; parasites, sewage and algal toxins can defeat correct identification.
- Take material from deadfall or abundant growth first. Roots, bark and whole plants are the most destructive harvests.
- Medicinal notes document traditional use only; the guide gives no dosing and does not replace medical care.

SURVIVAL STANDARD

A correct plant name is only the beginning. Also verify plant part, maturity, preparation, dose, contamination, legal access and local cultural protocol. When any one of those is uncertain, do not consume or medicate.

POSITIVE IDENTIFICATION AND PRACTICAL USE

The illustrations are form diagrams. The linked POWO and iNaturalist pages provide current photographs and taxonomic context.

1

1. PLACE

Confirm continent, elevation, water regime, soil and disturbance.

2

2. FORM

Tree, shrub, vine, herb, grass, sedge, palm, fern, succulent or aquatic.

3

3. LEAF

Arrangement, veins, edge, hairs, glands, sap, odor and underside.

4

4. STEM / BARK

Thorns, pith, nodes, buds, lenticels, fibers, latex and branching.

5

5. FLOWER / FRUIT

Petal count, inflorescence, fruit attachment, seed and maturity.

6

6. EXCLUDE

Name every dangerous look-alike and explain why it is different.

7

7. VERIFY

Use current regional flora, qualified local knowledge and several photos.

AUTOMATIC STOP LIST

No tasting to identify.
No unknown roots, bulbs or white umbels.
No unknown milky sap.
No raw wetland foods.
No medicinal dose experiments.
No smoke from unknown toxic wood.

USEFUL-PLANT HIERARCHY

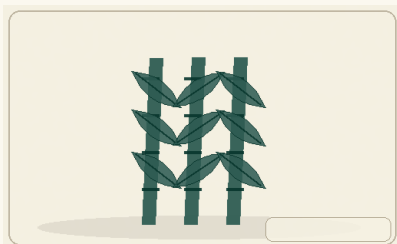
1. Deadfall and shed bark.
2. Abundant annual greens and fruit.
3. Pruned shoots and leaves.
4. Small stems from common thickets.
5. Roots, bark and whole plants only with permission and no safer substitute.

USEFUL PLANTS FOR TOOLS, FIRE AND SHELTER

Wood, fiber, tinder, bow-and-arrow components, friction fire, containers and construction.

SOUTH AMERICAN MOUNTAIN BAMBOO

USEFUL MATERIAL



Stylized form diagram — not an identification photograph

Chusquea spp.

IDENTIFY: Solid or nearly solid segmented culms; dense branching at nodes; narrow grass leaves.

HABITAT / SEASON: Andean and Atlantic montane forest, often forming thickets. Season: Culms year-round; shoots seasonal.

SURVIVAL USE: Arrow shafts, basketry, shelter lattice, containers and friction-fire spindles; shoots of selected species require expert preparation.

CAUTION: Dense thickets hide cliffs and animals. Some bamboos flower and die en masse.

LOOK-ALIKES: Reeds are hollow and rooted in wetlands rather than woody mountain thickets.

TASKS: arrow shaft, basketry, construction, bow drill spindle

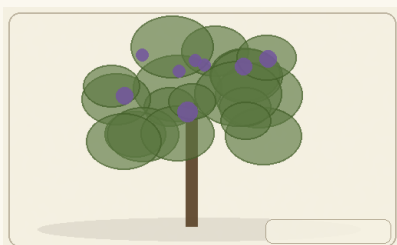
Verified images: POWO

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1

ALDERS

USEFUL MATERIAL



Stylized form diagram — not an identification photograph

Alnus spp.

IDENTIFY: Oval toothed leaves; catkins; woody cone-like female structures persist through winter.

HABITAT / SEASON: Wet thickets, streambanks, avalanche tracks and disturbed forest. Season: Wood year-round; leaves growing season.

SURVIVAL USE: Straight stems for racks and wattle; seasoned alder burns evenly and is widely used as smoking wood.

CAUTION: Wet alder smokes heavily; dense thickets can hide unstable banks.

LOOK-ALIKES: Birch lacks persistent woody cones.

TASKS: poles, wattle, fuel, smoking

Verified images: POWO

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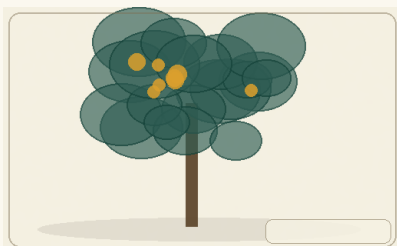
2

USEFUL PLANTS FOR TOOLS, FIRE AND SHELTER

Wood, fiber, tinder, bow-and-arrow components, friction fire, containers and construction.

CECROPIA

USEFUL MATERIAL



Stylized form diagram — not an identification photograph

Cecropia spp.

IDENTIFY: Large palmately lobed leaves pale beneath; ringed hollow stems; finger-like fruiting spikes.

HABITAT / SEASON: Tropical American forest gaps, roadsides and river edges. Season: Year-round.

SURVIVAL USE: Hollow stems can form tubes, floats and light containers; dry soft wood can be friction-fire material.

CAUTION: Ant colonies often inhabit stems. Fruit and medicinal use vary by species and are excluded without local expertise.

LOOK-ALIKES: Papaya leaves are deeply lobed but grow in a crown on one trunk.

TASKS: container, float, bow drill board

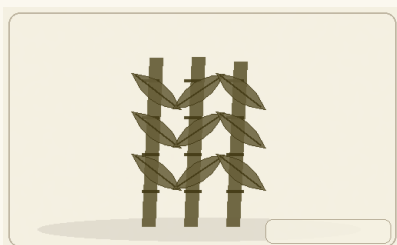
Verified images: POWO

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3

GUADUA BAMBOO

USEFUL MATERIAL



Stylized form diagram — not an identification photograph

Guadua angustifolia and related spp.

IDENTIFY: Large hollow segmented culms; branch thorns in some species; broad grass leaves.

HABITAT / SEASON: Tropical American riverbanks, foothills and disturbed forest. Season: Culms year-round; shoots rainy season.

SURVIVAL USE: Exceptional material for shelter, containers, water tubes, traps, arrow shafts, bows in laminated designs and friction-fire sets; young shoots of selected species require boiling.

CAUTION: Fresh culms can split explosively in fire. Species and shoot cyanide levels vary.

LOOK-ALIKES: Woody reeds are smaller and lack robust branching culms.

TASKS: construction, container, arrow shaft, bow drill, food shoot

Verified images: POWO

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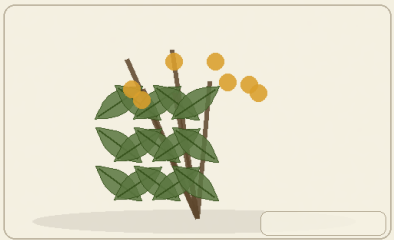
4

USEFUL PLANTS FOR TOOLS, FIRE AND SHELTER

Wood, fiber, tinder, bow-and-arrow components, friction fire, containers and construction.

DOGWOOD

USEFUL MATERIAL



Cornus spp.

IDENTIFY: Usually opposite branching; arcuate leaf veins curve toward the tip; clustered flowers and drupes.

HABITAT / SEASON: Forest edge, riparian thicket and mountain slope. Season: Stems year-round; fruit varies by species.

SURVIVAL USE: Dense straight shoots make excellent arrow shafts, skewers and pegs.
 CAUTION: Fruit edibility varies greatly; some species cause stomach upset. Use as material unless species is confirmed.
 LOOK-ALIKES: Viburnums may have opposite leaves but different veins and buds.
 TASKS: arrow shaft, pegs, skewers

Verified images: POWO

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5

MATERIAL SELECTION SCREEN

Before cutting, test straightness, grain, dryness, hidden rot, sap or smoke toxicity, and whether the species is protected. Match the material to the load: springy bow wood, straight shaft wood, soft dry hearth board, harder spindle, fibrous cordage, or resin-free cooking fuel.

LAND-BASED EDIBLE PLANTS

Documented foods on dry or seasonally dry ground. Preparation and contamination still matter.

WILD PASSIONFRUITS

LAND FOOD



Stylized form diagram — not an identification photograph

Passiflora spp.

IDENTIFY: Tendrilled vine; distinctive radial flowers; round to oval fruits; leaves often lobed.

HABITAT / SEASON: Tropical and subtropical forest edge, thicket and riverbank. Season: Fruit seasonal.

SURVIVAL USE: Fully ripe fruit of confirmed edible species is documented food; vines can provide temporary lashings.

CAUTION: Many species have cyanogenic leaves or unpalatable fruit. Eat only known ripe fruit, not unknown foliage.

LOOK-ALIKES: Cucurbit vines have separate flower structure and rough stems.

TASKS: food fruit, lashing

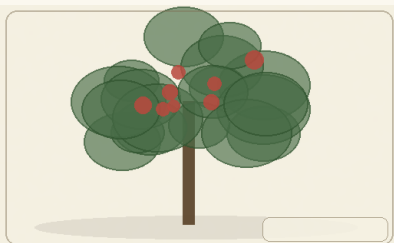
Verified images: POWO

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6

GUAVA

LAND FOOD



Stylized form diagram — not an identification photograph

Psidium guajava

IDENTIFY: Opposite oval leaves with strong parallel side veins; smooth peeling bark; white brush flowers; aromatic fruit.

HABITAT / SEASON: Tropical and subtropical disturbed ground, forest edge and river terraces. Season: Fruit varies by climate; wood year-round.

SURVIVAL USE: Ripe fruit is documented food; hard close-grained wood makes pegs, handles and friction-fire spindles.

CAUTION: Fruit can host insects and feral plants may be sprayed. Leaves are not a substitute for medical care.

LOOK-ALIKES: Other Myrtaceae share opposite leaves; fruit odor and flower structure help confirm.

TASKS: food fruit, handles, bow drill spindle

Verified images: POWO

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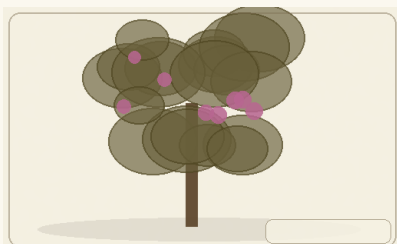
7

LAND-BASED EDIBLE PLANTS

Documented foods on dry or seasonally dry ground. Preparation and contamination still matter.

PAPAYA

LAND FOOD



Stylized form diagram — not an identification photograph

Carica papaya

IDENTIFY: Soft unbranched hollow trunk; crown of deeply lobed leaves; large fruits attached near the trunk.

HABITAT / SEASON: Tropical clearings, river terraces and abandoned cultivation. Season: Fruit year-round in warm climates.

SURVIVAL USE: Fully ripe fruit is documented food; black seeds are peppery but used sparingly. Green fruit is cooked in established cuisines.

CAUTION: Milky latex can irritate skin and may affect pregnancy or medications. Avoid wild fruit contaminated by animals.

LOOK-ALIKES: Cecropia has woody branching stems and finger-like fruits.

TASKS: food fruit, food green

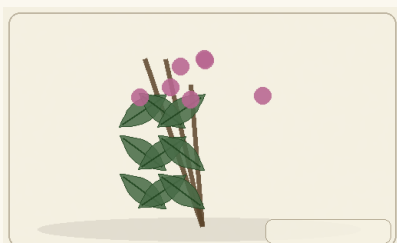
Verified images: POWO

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8

WILD ONIONS AND GARLIC

LAND FOOD



Stylized form diagram — not an identification photograph

Allium spp.

IDENTIFY: Narrow leaves or hollow stems; spherical flower heads; clear onion or garlic odor in leaf and bulb.

HABITAT / SEASON: Meadows, rocky slopes, open woodland and stream terraces. Season: Spring through fall.

SURVIVAL USE: Leaves, flowers and bulbs of positively identified *Allium* are documented food and seasoning.

CAUTION: Every sampled part must smell of onion, but odor is not the only test. Avoid unknown bulbs.

LOOK-ALIKES: Death camas lacks onion odor and can be fatal.

TASKS: food green, food bulb

Verified images: POWO

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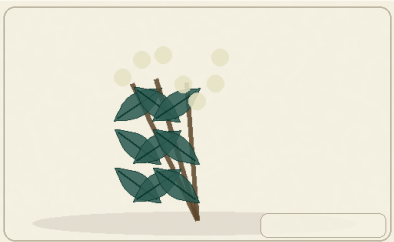
9

LAND-BASED EDIBLE PLANTS

Documented foods on dry or seasonally dry ground. Preparation and contamination still matter.

STINGING NETTLE

LAND FOOD



Stylized form diagram — not an identification photograph

Urtica dioica

IDENTIFY: Opposite sharply toothed leaves; fibrous stems; translucent stinging hairs; green flower clusters.

HABITAT / SEASON: Rich disturbed soil, river terraces, old camps and forest openings. Season: Young tops spring; fiber later.

SURVIVAL USE: Young tops are documented food after thorough cooking or drying; mature stems yield strong bast fiber.

CAUTION: Wear gloves; do not eat raw. Internal use can affect medicines and kidney conditions.

LOOK-ALIKES: Dead-nettles do not sting and have showier mint-family flowers.

TASKS: food green, cordage, fiber

Verified images: POWO

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FOOD HARVEST SCREEN

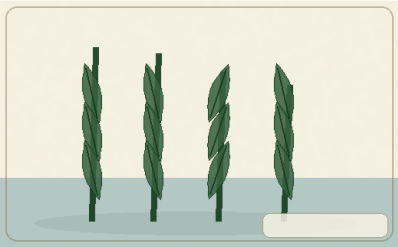
Confirm species, plant part and maturity. Check whether cooking, leaching, peeling, fermenting or repeated water changes are required. Reject mold, animal contamination, roadside plants, chemically treated ground and any food whose safe preparation cannot be completed with current water and fuel.

WATER AND WETLAND EDIBLE PLANTS

Freshwater, marsh, tidal and marine foods. Correct ID does not make dirty water safe.

WATERCRESS

AQUATIC FOOD



Nasturtium officinale

IDENTIFY: Creeping hollow stems; pinnate leaves with a larger rounded terminal leaflet; small white four-petaled flowers.

HABITAT / SEASON: Cold flowing springs and streams, often where nutrient-rich. Season: Cool seasons.

SURVIVAL USE: Tender tops are documented food and are usually cooked in survival settings.
 CAUTION: Raw watercress can carry liver flukes and sewage pathogens. Avoid downstream of livestock, roads or settlements.
 LOOK-ALIKES: Water hemlock has divided leaves and umbrella flowers; never rely on habitat alone.
 TASKS: food green

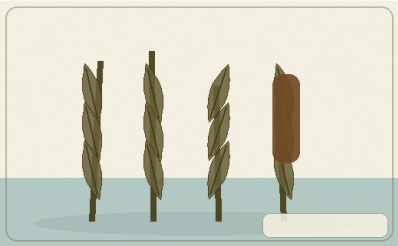
Verified images: POWO

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11

TROPICAL ARROWHEADS

AQUATIC FOOD



Sagittaria guayanensis and related spp.

IDENTIFY: Arrow to oval leaves rising from shallow water; three-petaled white flowers; some produce tubers.

HABITAT / SEASON: Floodplains, marshes and slow tropical water. Season: Tubers seasonal.

SURVIVAL USE: Tubers of confirmed edible species are documented food after cooking.
 CAUTION: Species vary in tuber production; wetlands may contain parasites and toxic aroids.
 LOOK-ALIKES: Arrow arum and other aroids have spadix-and-spathe flowers.
 TASKS: food tuber

Verified images: POWO

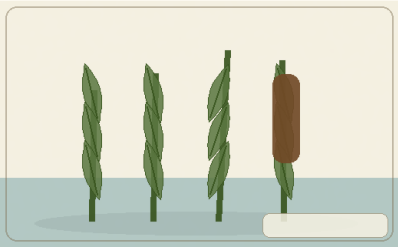
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WATER AND WETLAND EDIBLE PLANTS

Freshwater, marsh, tidal and marine foods. Correct ID does not make dirty water safe.

CATTAILS
AQUATIC FOOD



Typha spp.

IDENTIFY: Tall flat strap leaves; dense brown cylindrical female flower spike below a narrower male section.

HABITAT / SEASON: Marshes, pond edges, slow channels and wet ditches. Season: Shoots spring; pollen early summer; rhizomes year-round where lawful.

SURVIVAL USE: Documented food parts include young inner shoots, pollen and processed rhizome starch. Leaves make mats, baskets and thatch; seed down can bulk tinder.

CAUTION: Water can concentrate sewage, metals and parasites. Raw rhizome requires correct processing; avoid contaminated marshes.

LOOK-ALIKES: Yellow flag iris has sword leaves and showy flowers but no brown cattail head.

TASKS: food shoot, food starch, basketry, thatch, tinder

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AQUATIC HARVEST SCREEN

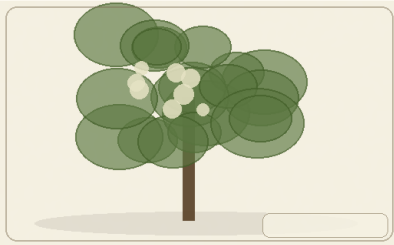
Check five separate questions: Is the species correct? Is the plant part edible? Is the water free of sewage, mining or farm runoff? Are parasites or harmful algal blooms plausible? Is entry and exit from the water safe? A “yes” to the plant and a “no” to the water still means do not eat.

MEDICINAL AND TRADITIONAL-USE PLANTS

Traditional and historical uses only — no dosing, diagnosis or treatment claims.

CINCHONA TREES

TRADITIONAL-USE



Stylized form diagram — not an identification photograph

Cinchona spp.

IDENTIFY: Opposite leaves with interpetiolar stipules; pink-white tubular flowers; dry capsules.

HABITAT / SEASON: Andean cloud forest. Season: Bark year-round.

SURVIVAL USE: Historically important source of quinine alkaloids and useful straight wood.

CAUTION: Do not self-dose bark: alkaloid concentration varies and can cause serious heart, hearing and blood effects. Harvest is regulated.

LOOK-ALIKES: Many Rubiaceae have opposite leaves and stipules.

TASKS: medicine, poles

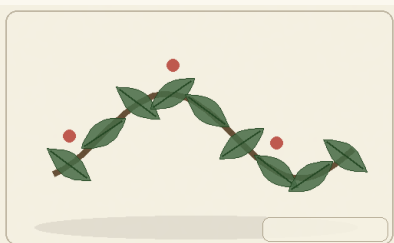
Verified images: POWO

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CAT'S-CLAW VINE

TRADITIONAL-USE



Stylized form diagram — not an identification photograph

Uncaria tomentosa and related spp.

IDENTIFY: Woody climbing vine with paired curved hook-like spines at nodes and opposite leaves.

HABITAT / SEASON: Amazonian and Andean foothill forest. Season: Stems year-round.

SURVIVAL USE: Strong vines have lashing uses; bark has documented regional medicinal use.

CAUTION: Do not self-dose; pregnancy, immune and medication interactions are concerns. Several Uncaria species differ.

LOOK-ALIKES: Other hook-bearing lianas and rattan palms may resemble it.

TASKS: lashing, medicine

Verified images: POWO

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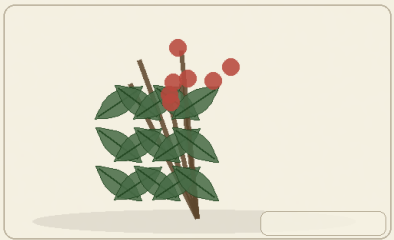
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MEDICINAL AND TRADITIONAL-USE PLANTS

Traditional and historical uses only — no dosing, diagnosis or treatment claims.

MUÑA

TRADITIONAL-USE



Minthostachys mollis

IDENTIFY: Mint-family shrub with opposite aromatic leaves and small white-lilac flowers.

HABITAT / SEASON: Andean dry slopes, field edges and highland scrub. Season: Leaves growing season.

SURVIVAL USE: Documented Andean seasoning and traditional digestive use; dry stems aid tinder.

CAUTION: Essential oils and concentrated teas are not safe field dosing, especially in pregnancy.

LOOK-ALIKES: Other mint-family shrubs require flower and scent confirmation.

TASKS: seasoning, medicine, tinder

Verified images: POWO

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MEDICINAL RESTRAINT

A plant can be culturally important and pharmacologically active yet still be the wrong survival choice. Unknown concentration, dehydration, pregnancy, allergies, chronic illness and medicine interactions can turn a traditional remedy into a second emergency.

POISONOUS PLANTS AND DANGEROUS LOOK-ALIKES

High-consequence species to learn before gathering starts.

ANGEL'S TRUMPET

POISON — AVOID



Stylized form diagram — not an identification photograph

Brugmansia spp.

IDENTIFY: Woody shrub or small tree with very large hanging trumpet flowers and soft leaves.

HABITAT / SEASON: Andean and tropical American disturbed forest and cultivation. Season: Year-round in warm climates.

SURVIVAL USE: No use.

CAUTION: All parts contain dangerous tropane alkaloids causing delirium, overheating, seizures and death.

LOOK-ALIKES: Datura has upright trumpets and spiny capsules but is equally toxic.

TASKS: poison

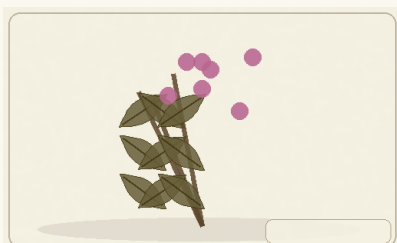
Verified images: POWO

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MONKSHOODS

POISON — AVOID



Stylized form diagram — not an identification photograph

Aconitum spp.

IDENTIFY: Deeply divided palmate leaves; blue, purple, yellow or white hood-shaped flowers.

HABITAT / SEASON: Moist mountain meadows, streambanks and cool forest. Season: Summer.

SURVIVAL USE: No food or field medicinal use.

CAUTION: All parts contain potent aconitine-type alkaloids; ingestion can cause fatal heart and nerve effects.

LOOK-ALIKES: Larkspurs have a rear spur and are also toxic.

TASKS: poison

Verified images: POWO

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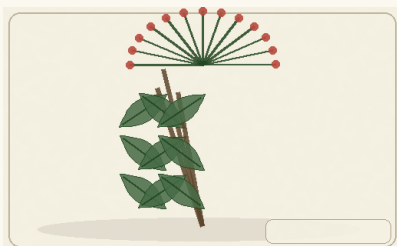
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POISONOUS PLANTS AND DANGEROUS LOOK-ALIKES

High-consequence species to learn before gathering starts.

WATER HEMLOCKS

POISON — AVOID



Stylized form diagram — not an identification photograph

Cicuta spp.

IDENTIFY: Wetland perennial with divided leaves, white umbrella flower clusters and thick chambered rootstocks.

HABITAT / SEASON: Marshes, wet meadows, stream edges and ditches across the northern hemisphere. Season: Spring through fall.

SURVIVAL USE: No survival use. Make wetland root gathering a prohibited activity unless a qualified botanist is present.

CAUTION: Extremely poisonous; small amounts, especially roots, can cause violent seizures and death.

LOOK-ALIKES: Angelica, cow parsnip and other Apiaceae can look similar. Never taste to decide.

TASKS: poison

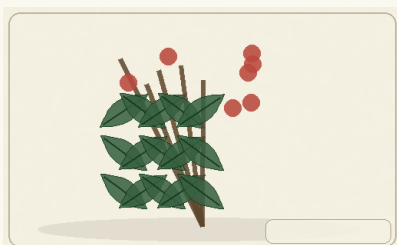
Verified images: POWO

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CASTOR BEAN

POISON — AVOID



Stylized form diagram — not an identification photograph

Ricinus communis

IDENTIFY: Large star-shaped palmately lobed leaves; spiny capsules; glossy mottled seeds.

HABITAT / SEASON: Warm disturbed ground, riverbanks and tropical/subtropical waste areas. Season: Growing season; seeds seasonal.

SURVIVAL USE: No survival food or medicine use. Oil extraction is industrial, not a field process.

CAUTION: Chewed seeds can release ricin and cause severe or fatal poisoning.

LOOK-ALIKES: Jatropha has similar lobed leaves but different fruit; it is also toxic.

TASKS: poison

Verified images: POWO

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SURVIVAL TASK MATRIX

Choose the least destructive plant that meets the job. A material that works poorly but is abundant may beat the perfect rare species.

TASK	BEST REGIONAL CANDIDATES IN THIS GUIDE	FIELD DECISION
Bow / spring wood	No reliable candidate among the priority profiles.	Use a different technology or carried tool; do not force unsuitable plant material.
Arrow or dart shaft	South American mountain bamboo, Guadua bamboo, Dogwoods	Use dead, shed or pruned material first.
Bow-drill hearth	Cecropia	Use dead, shed or pruned material first.
Bow-drill spindle	South American mountain bamboo, Guava	Use dead, shed or pruned material first.
Tinder	Cattails, Muña	Use dead, shed or pruned material first.
Fuel / coals	Alders	Use dead, shed or pruned material first.
Cordage / fiber	Stinging nettle	Use dead, shed or pruned material first.
Basket / mat	South American mountain bamboo, Cattails	Use dead, shed or pruned material first.
Container / wrap	Cecropia, Guadua bamboo	Use dead, shed or pruned material first.
Fruit food	Wild passionfruits, Guava, Papaya	Verify part, maturity and preparation.
Green food	Papaya, Wild onions and garlic, Stinging nettle, Watercress	Verify part, maturity and preparation.
Seed / nut	No reliable candidate among the priority profiles.	Use a different technology or carried tool; do not force unsuitable plant material.
Root / starch	Cattails	Verify part, maturity and preparation.
Traditional-use	Cinchona trees, Cat’s-claw vine, Muña	Documented use only; no field dosing.

SEASONAL OPERATING RHYTHM

PHASE	PRIMARY OPPORTUNITY	PRIMARY RISK
Early growth	Shoots, greens, flowers, sap and easy bark identification.	Toxic shoots and bulbs are hardest to separate before flowering.
Peak growth	Maximum leaf and flower information; fiber plants mature.	Heat, insects, sap and water contamination.
Fruit / seed	Highest food density; nuts, berries, pods, grains and tubers.	Mold, wildlife encounters and unripe or toxic fruit.
Dormant / dry	Wood, bark, evergreen leaves, persistent fruit and roots.	Fewer diagnostic traits; overharvest of stored underground parts.

SOURCES, IMAGE VERIFICATION AND EMERGENCY

Every profile links to current taxonomic and photograph searches. Treat community photographs as evidence to compare, not as a final authority.

1. 2023 USDA Plant Hardiness Zone Map

USDA Agricultural Research Service — hardiness-zone reference

<https://planthardiness.ars.usda.gov/>

2. Plants of the World Online

Royal Botanic Gardens, Kew — taxonomy, distribution and images

<https://powo.science.kew.org/>

3. World Flora Online

World Flora Online Consortium — global plant taxonomy

<https://www.worldfloraonline.org/>

4. Global Biodiversity Information Facility

GBIF Secretariat — occurrence records and licensed media

<https://www.gbif.org/>

5. World Checklist of Useful Plant Species

Royal Botanic Gardens, Kew — documented plant uses

<https://kew.iro.bl.uk/concern/datasets/7243d727-e28d-419d-a8f7-9ebef5b9e03e>

6. Poison Control

National Capital Poison Center — poisoning first-response guidance

<https://www.poison.org/>

7. WHO Monographs on Selected Medicinal Plants

World Health Organization — medicinal-plant safety and monographs

<https://www.who.int/publications/i/item/9241545178>

8. Tropicos

Missouri Botanical Garden — American and global botanical records

<https://tropicos.org/>

9. Flora e Funga do Brasil

Jardim Botânico do Rio de Janeiro — Brazilian scientific flora

<https://floradobrasil.jbrj.gov.br/>

SUSPECTED POISONING

Stop exposure. Remove material from the mouth and rinse. Do not induce vomiting unless directed. Save a sample or clear photographs. Contact local emergency services or a poison center. Monitor airway, breathing and consciousness.

PUBLICATION LIMITS

Regional lists are representative, not exhaustive. Species ranges, names, laws and preparation practices change. Local floras, land managers, Indigenous knowledge holders, poison centers and clinicians take precedence.