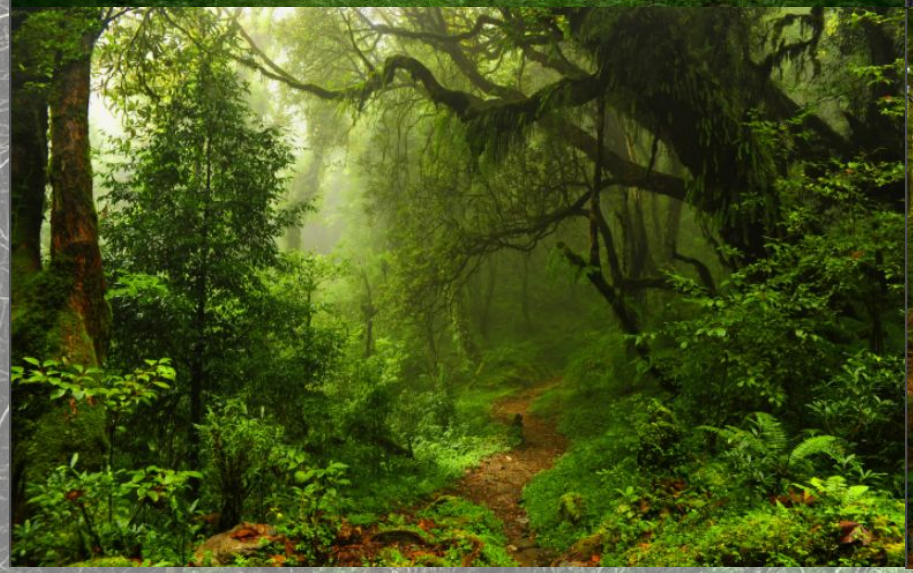
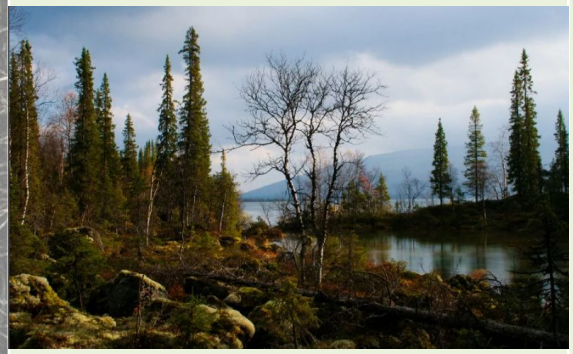
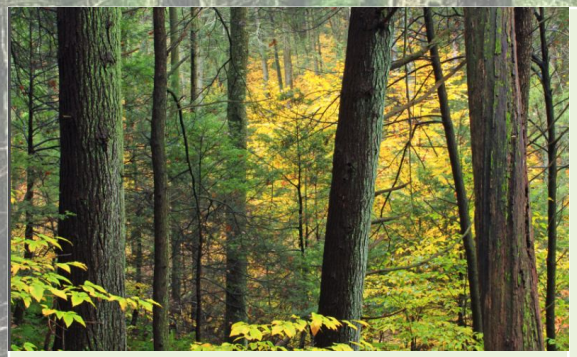
TYPES OF FOREST

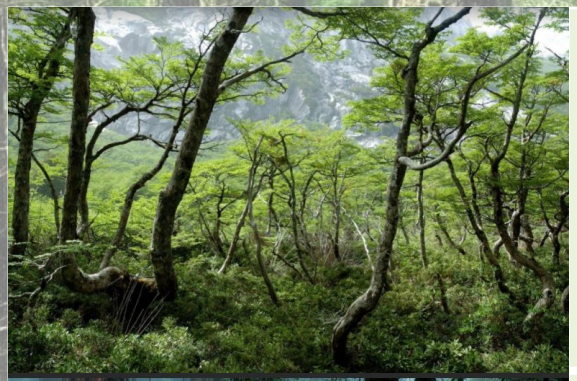
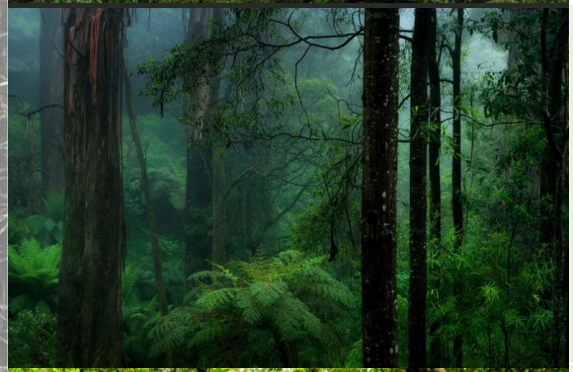
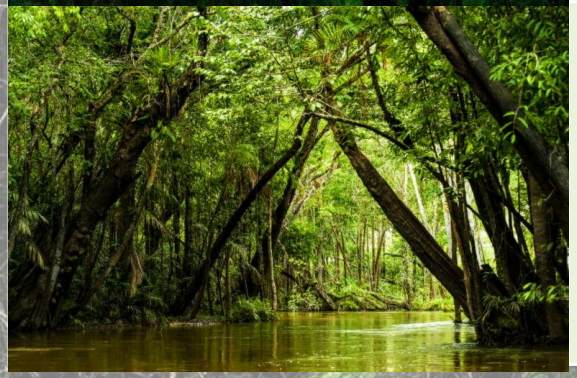





	forest – лес	[ˈfɒrɪst]
	boreal forest – таёжный лес	[ˈbɔːrɪəl ˈfɒrɪst]
	taiga - тайга	[ˈtaɪgə]

	broadleaf and mixed forests – широколиственные и смешанные леса	[ˈbrɔːdliːf mɪkstˈfɒrɪs ts]
	coniferous forest – хвойный лес	[kəˈnɪf(ə)rəs ˈfɒrɪst]
	rainforest - тропический лес	[ˈreɪnfɒrɪst]

	laurel forest – лавровый лес	[ˈlɒrəl ˈfɒrɪst]
	moist broadleaf forest – влажный широколиственный лес	[mɔɪst ˈbrɔːdliːfˈfɒrɪsts]
	jungle - джунгли	[ʤʌŋgl]

	subtropical dry broadleaf forest – субтропический сухой широколиственный лес	[ˈsʌbˈtrɔpɪkəl draɪ ˈbrɔːdliːf ˈfɒrɪst]
	tropical coniferous forest – тропический хвойный лес	[ˈtrɒpɪkəl kəˈnɪf(ə)rəs ˈfɒrɪsts]
	tropical rainforest - тропический дождевой лес	[ˈtrɒpɪkəl ˈreɪnfɒrɪst]

seasonal tropical forest – сезонныq тропическиq лес	[ˈsiːz(ə)nəl ˈtrɒpɪkəl ˈfɒrɪst]

Forest

A forest is an area of land dominated by trees. Hundreds of definitions of forest are used throughout the world, incorporating factors such as tree density, tree height, land use, legal standing and ecological function. The Food and Agriculture Organization defines a forest as 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. Using this definition FRA 2020 found that forests covered 4.06 billion hectares or approximately 31 percent of the global land area in 2020 but are not equally distributed around the globe.

Forests are the dominant terrestrial ecosystem of Earth, and are distributed around the globe. More than half of the world's forests are found in only five countries (Brazil, Canada, China, Russian Federation and United States of America). The largest part of the forest (45 percent) is found in the tropical domain, followed by the boreal, temperate and subtropical domains.

Forests account for 75% of the gross primary production of the Earth's biosphere, and contain 80% of the Earth's plant biomass. Net primary production is estimated at 21.9 gigatonnes carbon per year for tropical forests, 8.1 for temperate forests, and 2.6 for boreal forests.

Boreal forest

Taiga

Taiga, generally referred to in North America as boreal forest or snow forest, is a biome characterized by coniferous forests consisting mostly of pines, spruces, and larches.

The taiga or boreal forest has been called the world's largest land biome. In North America, it covers most of inland Canada, Alaska, and parts of the northern contiguous United States. In Eurasia, it covers most of Sweden, Finland, much of Russia from Karelia in the west to the Pacific Ocean (including much of Siberia), much of Norway and Estonia, some of the Scottish Highlands, some lowland/coastal areas of Iceland, and areas of northern Kazakhstan, northern Mongolia, and northern Japan (on the island of Hokkaidō).

The main tree species, the length of the growing season and summer temperatures vary across the world. The taiga of North America is mostly spruce, Scandinavian and Finnish taiga consists of a mix of spruce, pines and birch, Russian taiga has spruces, pines and larches depending on the region, while the Eastern Siberian taiga is a vast larch forest.

Taiga in its current form is a relatively recent phenomenon, having only existed for the last 12,000 years since the beginning of the Holocene epoch, covering land that had been mammoth steppe or under the Scandinavian Ice Sheet in Eurasia and under the Laurentide Ice Sheet in North America during the Late Pleistocene.

Broadleaf and mixed forests

Temperate broadleaf and mixed forest is a temperate climate terrestrial habitat type defined by the World Wide Fund for Nature, with broadleaf tree ecoregions, and with conifer and broadleaf tree mixed coniferous forest ecoregions.

These forests are richest and most distinctive in central China and eastern North America, with some other globally distinctive ecoregions in the Caucasus, the Himalayas, Southern Europe, Australasia, southern South America and the Russian Far East.

In the Northern hemisphere, characteristic dominant broadleaf trees in this biome include oaks, beeches, maples, or birches. The term "mixed forest" comes from the inclusion of coniferous trees as a canopy component of some of these forests. Typical coniferous trees include pines, firs, and spruces. In some areas of this biome, the conifers may be a more important canopy species than the broadleaf species. In the Southern Hemisphere, endemic genera such as Nothofagus and Eucalyptus occupy this biome, and most coniferous trees occur in mixtures with broadleaf species, and are classed as broadleaf and mixed forests.

Coniferous forest

Temperate coniferous forest is a terrestrial biome defined by the World Wide Fund for Nature. Temperate coniferous forests are found predominantly in areas with warm summers and cool winters, and vary in their kinds of plant life. In some, needleleaf trees dominate, while others are home primarily to broadleaf evergreen trees or a mix of both tree types. A separate habitat type, the tropical coniferous forests, occurs in more tropical climates.

Temperate coniferous forests are common in the coastal areas of regions that have mild winters and heavy rainfall, or inland in drier climates or montane areas. Many species of trees inhabit these forests including pine, cedar, fir, and redwood. The understory also contains a wide variety of herbaceous and shrub species. Temperate coniferous forests sustain the highest levels of biomass in any terrestrial ecosystem and are notable for trees of massive proportions in temperate rainforest regions.

Structurally, these forests are rather simple, consisting of 2 layers generally: an overstory and understory. However, some forests may support a layer of shrubs. Pine forests support an herbaceous ground layer that may be dominated by grasses and forbs that lend themselves to ecologically important wildfires. In contrast, the moist conditions found in temperate rain forests favor the dominance by ferns and some forbs. Forest communities dominated by huge trees, unusual ecological phenomena, occur in western North America, southwestern South America, as well as in the Australasian region in such areas as southeastern Australia and northern New Zealand.

Rainforest

Temperate rainforests are coniferous or broadleaf forests that occur in the temperate zone and receive heavy rainfall.

Temperate rain forests occur in oceanic moist regions around the world: the Pacific temperate rain forests of North American Pacific Northwest as well as the Appalachian temperate rainforest of the Eastern U.S. Sun Belt; the Valdivian temperate rain forests of southwestern South America; the rain forests of New Zealand, Tasmania and southeastern Australia; northwest Europe (small pockets in Great Britain and larger areas in Ireland, southern Norway and northern Iberia); southern Japan; the Black Sea–Caspian Sea region from the southeasternmost coastal zone of the Bulgarian coast, through Turkey, to Georgia, and northern Iran.

The moist conditions of temperate rain forests generally support an understory of mosses, ferns and some shrubs and berries. Temperate rain forests can be temperate coniferous forests or temperate broadleaf and mixed forests.

Laurel forest

Laurel forest, also called laurisilva or laurissilva, is a type of subtropical forest found in areas with high humidity and relatively stable, mild temperatures. The forest is characterized by broadleaf tree species with evergreen, glossy and elongated leaves, known as "laurophyll" or "lauroid". Plants from the laurel family may or may not be present, depending on the location.

Laurel forests are characterized by evergreen and hardwood trees, reaching up to 40 metres in height. Laurel forest, laurisilva, and laurissilva all refer to plant communities that resemble the bay laurel.

Some species belong to the true laurel family, Lauraceae, but many have similar foliage to the Lauraceae due to convergent evolution. As in any other rainforest, plants of the laurel forests must adapt to high rainfall and humidity. The trees have adapted in response to these ecological drivers by developing analogous structures, leaves that repel water. Laurophyll or lauroid leaves are characterized by a generous layer of wax, making them glossy in appearance, and a narrow, pointed oval shape with an apical mucro or "drip tip", which permits the leaves to shed water despite the humidity, allowing respiration. The scientific names laurina, laurifolia, laurophylla, lauriformis, and lauroides are often used to name species of other plant families that resemble the Lauraceae of emergent trees.

Moist broadleaf forests

Jungle

Tropical and subtropical moist forest, also known as tropical moist forest, is a tropical and subtropical forest habitat type defined by the World Wide Fund for Nature. The habitat type is sometimes known as jungle.

Forest composition is dominated by evergreen and semi-evergreen deciduous tree species. These trees number in the thousands and contribute to the highest levels of species diversity in any terrestrial major habitat type. In general, biodiversity is highest in the forest canopy. The canopy can be divided into five layers: overstory canopy with emergent crowns, a medium layer of canopy, lower canopy, shrub level, and finally understory. These forests are home to more species than any other terrestrial ecosystem: Half of the world's species may live in these forests, where a square kilometer may be home to more than 1,000 tree species. These forests are found around the world, particularly in the Indo-Malayan Archipelago, the Amazon Basin, and the African Congo Basin.

A perpetually warm, wet climate makes these environments more productive than any other terrestrial environment on Earth and promotes explosive plant growth. A tree here may grow over 23 metres in height in just 5 years. From above, the forest appears as an unending sea of green, broken only by occasional, taller "emergent" trees. These towering emergents are the realm of hornbills, toucans, and the harpy eagle. The canopy is home to many of the forest's animals, including apes and monkeys. Below the canopy, a lower understory hosts to snakes and big cats. The forest floor, relatively clear of undergrowth due to the thick canopy above, is prowled by other animals such as gorillas and deer.

Subtropical dry broadleaf forest

The subtropical dry forest is a habitat type defined by the World Wide Fund for Nature and is located at tropical and subtropical latitudes. Though these forests occur in climates that are warm year-round, and may receive several hundred centimeters of rain per year, they have long dry seasons which last several months and vary with geographic location. These seasonal droughts have great impact on all living things in the forest.

Deciduous trees predominate in most of these forests, and during the drought a leafless period occurs, which varies with species type. Because trees lose moisture through their leaves, the shedding of leaves allows trees such as teak and mountain ebony to conserve water during dry periods. The newly bare trees open up the canopy layer, enabling sunlight to reach ground level and facilitate the growth of thick underbrush. Trees on moister sites and those with access to ground water tend to be evergreen. Infertile sites also tend to support evergreen trees. Three tropical dry forest ecoregions, the East Deccan dry evergreen forests, the Sri Lanka dry-zone dry evergreen forests, and the Southeastern Indochina dry evergreen forests, are characterized by evergreen trees.

Though less biologically diverse than rainforests, tropical dry forests are home to a wide variety of wildlife including monkeys, deer, large cats, parrots, various rodents, and ground dwelling birds. Mammalian biomass tends to be higher in dry forests than in rain forests, especially in Asian and African dry forests. Many of these species display extraordinary adaptations to the difficult climate.

Tropical coniferous forest

Tropical coniferous forests are a tropical forest habitat type defined by the World Wide Fund for Nature. These forests are found predominantly in North and Central America and experience low levels of precipitation and moderate variability in temperature. Tropical and subtropical coniferous forests are characterized by diverse species of conifers, whose needles are adapted to deal with the variable climatic conditions. Most tropical and subtropical coniferous forest ecoregions are found in the Nearctic and Neotropical realms, from the Mid-Atlantic states to Nicaragua and on the Greater Antilles, Bahamas, and Bermuda. Other tropical and subtropical coniferous forests ecoregions occur in Asia. Mexico harbors the world's richest and most complex subtropical coniferous forests. The conifer forests of the Greater Antilles contain many endemics and relictual taxa.

Many migratory birds and butterflies spend winter in tropical and subtropical conifer forests. This biome features a thick, closed canopy which blocks light to the floor and allows little underbrush. As a result, the ground is often covered with fungi and ferns. Shrubs and small trees compose a diverse understory.

Tropical rainforest

Tropical rainforests are rainforests that occur in areas of tropical rainforest climate in which there is no dry season – all months have an average precipitation of at least 60 mm – and may also be referred to as lowland equatorial evergreen rainforest. True rainforests are typically found between 10 degrees north and south of the equator; they are a sub-set of the tropical forest biome that occurs roughly within the 28-degree latitudes (in the equatorial zone between the Tropic of Cancer and Tropic of Capricorn). Within the World Wildlife Fund's biome classification, tropical rainforests are a type of tropical moist broadleaf forest (or tropical wet forest) that also includes the more extensive seasonal tropical forests.

Tropical rainforests can be characterized in two words: hot and wet. Mean monthly temperatures exceed 18 °C during all months of the year. Average annual rainfall is no less than 1,680 mm and can exceed 10 m although it typically lies between 1,750 mm and 3,000 mm. This high level of precipitation often results in poor soils due to leaching of soluble nutrients in the ground.

Seasonal tropical forest

Seasonal tropical forest, also known as moist deciduous, semi-evergreen seasonal, tropical mixed or monsoon forests, typically contain a range of tree species: only some of which drop some or all of their leaves during the dry season. This tropical forest is classified under the Walter system as tropical climate with high overall rainfall (typically in the 1000–2500 mm range) concentrated in the summer wet season and (an often cooler "winter") dry season: representing a range of habitats influenced by monsoon or tropical wet savannah climates. Drier forests in the Aw climate zone are typically deciduous and placed in the Tropical dry forest biome: with further transitional zones (ecotones) of savannah woodland then tropical and subtropical grasslands, savannas, and shrublands.

As with tropical rainforests there are different canopy layers, but these may be less pronounced in mixed forests, which are often characterised by numerous lianas due to their growth advantage during the dry season. The colloquial term jungle (Forest) originally derived from Sanskrit, has no specific ecological meaning but originally referred to this type of primary and especially secondary forest in the Indian subcontinent. Determining which stands of mixed forest are primary and secondary can be problematic, since the species mixture is influenced by factors such as soil depth and climate, as well as human interference.