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**Falldown effect:** a decline in timber supply or harvest level associated with the transition from harvesting the original stock of natural mature timber over one rotation to harvesting at a non declining level (typically equal to the annual increment) after conversion to a forest with a balanced age class structure.

**Feller-buncher:** a harvesting machine that cuts a tree with shears or a saw and then piles it.

**Felling and bucking:** the process of cutting down standing timber and then cutting it into specific lengths for yarding and hauling.

**Fertilization:** the addition of fertilizer to promote tree growth on sites deficient in one or more soil nutrients. Also used to improve the vigor of crop trees following juvenile spacing or commercial thinning.

**Fill:** material used to raise the desired road profile above the natural ground line.

**Fill bank:** the fill material used to shape a road from the outer edge of the travelled portion to its intersection with the existing ground profile.

**Fill-in planting:** planting required to supplement poorly stocked natural regeneration or to replace seedlings that have died on previously planted sites.

**Fill slope:** the face of an embankment required to raise the desired road profile above the natural ground line.

**Fine filter approach:** an approach to maintaining biodiversity that is directed toward particular habitats or individual species that might fall through the coarse filter. These habitats may be critical in some way and the species threatened or endangered.

**Fire danger:** an assessment of both fixed and variable factors of the fire environment, which determine the ease of ignition, rate of spread, difficulty of control, and the fire impact.

**Fire hazard:** the potential fire behavior for a fuel type, regardless of the fuel type's weather-influenced fuel moisture content or its resistance to fireguard construction. Assessment is based on physical fuel characteristics, such as fuel arrangement, fuel load, condition of herbaceous vegetation, and presence of elevated fuels.

**Fire impact(s):** the immediately evident effect of fire on the ecosystem in terms of biophysical alterations (e.g., crown scorch, mineral soil erosion, depth of burn, fuel consumption).

**Fireline:** that portion of the fire upon which resources are deployed and actively engaged in suppression action. In a general sense, the working area around a fire.

**Fire management:** the activities concerned with the protection of people, property and forest areas from wildfire and the use of prescribed burning for the attainment of forest management and other land use objectives, all conducted in a manner that considers environmental, social and economic criteria.

**Fire retardant:** a substance that by chemical or physical action reduces flammability of combustibles.

**Fire risk:** the probability or chance of fire starting determined by the presence and activities of causative agents.

**Fire season:** the period(s) of the year during which fires are likely to start, spread and do damage to values-at-risk sufficient to warrant organized fire suppression; a period of the year set out and commonly

referred to in fire prevention legislation. In B.C. the fire season is considered to extend from April 1 to October 31.

**Fire suppressant:** an agent directly applied to burning fuels to extinguish the flaming and smoldering or glowing stages of combustion.

**Fire suppression:** all activities concerned with controlling and extinguishing a fire following its detection. Synonymous with fire control.

**Fire Weather Index (FWI):** see Canadian Forest Fire Weather Index System

**Firebreak:** see Fuelbreak.

**Fireguard:** a strategically planned barrier, either manually or mechanically constructed, intended to stop a fire or retard its rate of spread and from which suppression action is carried out to control a fire; the constructed portion of a control line.

**First order stream:** stream originating in a seepage zone or spring, with no entering tributaries; the most headward channels in the drainage network.

**First pass:** the first of two or more planned entries over a specific period of time (usually one rotation) to harvest timber.

**Fish-bearing waters:** lakes, streams, and ponds that have resident fish populations.

**Fisheries-sensitive zones:** side and back channels, valley wall ponds, swamps, seasonally flooded depressions, lake littoral zones and estuaries that are seasonally occupied by over-wintering anadromous fish.

**Fisheries stream class A:** streams or portions of streams that are frequented by anadromous salmonids and/or resident game fish or regionally significant fish species; or streams that have been identified for fishery enhancement in an approved fishery management plan.

**Fixed area plot sampling method:** a controlled cruise method where small plots of a fixed size are used to sample a portion of a forest area to obtain information (such as tree volume) that can be used to describe the whole area.

**Flood discharge criteria:** the volume of flood that a bridge or culvert must be designed to accommodate.

**Floodplain:** a level, low-lying area adjacent to streams that is periodically flooded by stream water. It includes lands at the same elevation as areas with evidence of moving water, such as active or inactive flood channels, recent fluvial soils, sediment on the ground surface or in tree bark, rafted debris, and tree scarring.

**Fluvial processes:** all processes and events by which the configuration of a stream channel is changed; especially processes by which sediment is transferred along the stream channel by the force of flowing water.

**Flyrock:** rock displaced by blasting and propelled beyond recoverable limits.

**Foliar analysis:** chemical evaluation of the status of plant nutrients or the plant-nutrient requirements of a soil by the analysis of leaves or needles.

**Forage:** grasses, herbs and small shrubs that can be used as feed for livestock or wildlife.

**Ford:** a dip constructed in the roadbed at a stream crossing, instead of a culvert or bridge. The streambed must be of erosion-resistant material, or such material must be placed in contact with the streambed.

**Forest:** as defined by the Forest Practices Code of British Columbia Act includes all of the following - forest land, whether Crown land or private land; Crown range; Crown land or private land that is predominantly maintained in one or more successive stands of trees, successive crops of forage, or wilderness.

**Forest Appeals Commission (FAC):** the Forest Appeals Commission is the independent appeal body established under the Forest Practices Code of British Columbia Act to hear appeals from certain enforcement determinations.

**Forest cover:** forest stands or cover types consisting of a plant community made up of trees and other woody vegetation, growing more or less closely together.

**Forest cover map:** a map showing relatively homogeneous forest stands or cover types, produced from the interpretation of aerial photos and information collected in field surveys. Commonly includes information on species, age class, height class, site, and stocking level.

**Forest cover type:** a descriptive term used to group stands of similar characteristics and species composition (due to given ecological factors) by which they may be differentiated from other groups of stands.

**Forest development plan:** an operational plan guided by the principles of integrated resource management (the consideration of timber and non timber values), which details the logistics of timber development over a period of usually five years. Methods, schedules, and responsibilities for accessing, harvesting, renewing, and protecting the resource are set out to enable site-specific operations to proceed.

**Forest Development Review Committee (FDRC):** the group made up of government organizations, stakeholders, licensees, and the general public that is responsible for reviewing development plans.

**Forest ecology:** the relationships between forest organisms and their environment.

**Forest Ecosystem Network (FEN):** a planned landscape zone that serves to maintain or restore the natural connectivity within a landscape unit. A forest ecosystem network consists of a variety of fully protected areas, sensitive areas, classified areas, and old-growth management areas.

**Forest fire:** any wildfire or prescribed fire that is burning in forest, grass, alpine or tundra vegetation types.

**Forest floor:** layers of fresh leaf and needle litter, moderately decomposed organic matter, and humus or well-decomposed organic residue.

**Forest floor displacement hazard:** a ranking of the potential adverse impacts on forest productivity resulting from removal of the accumulated organic matter that constitutes the forest floor. It is determined in accordance with procedures set out in the Ministry of Forests' publication "Hazard Assessment Keys for Evaluating Site Sensitivity to Soil Degrading Processes Guidebook," as amended from time to time.

**Forest health:** a forest condition that is naturally resilient to damage; characterized by biodiversity, it contains sustained habitat for timber, fish, wildlife, and humans, and meets present and future resource management objectives.

**Forest health agents:** biotic and abiotic influences on the forest that are usually a naturally occurring component of forest ecosystems. Biotic influences include fungi, insects, plants, animals, bacteria, and

nematodes. Abiotic influences include frost, snow, fire, wind, sun, drought, nutrients, and human-caused injury.

**Forest health treatments:** the application of techniques to influence pest or beneficial organism populations, mitigate damage, or reduce the risk of future damage to forest stands. Treatments can be either proactive (for example, spacing trees to reduce risk of attack by bark beetles) or reactive (for example, spraying insecticides to treat outbreaks of gypsy moth).

**Forest interior conditions:** conditions found deep within forests, away from the effect of open areas. Forest interior conditions include particular microclimates found within large forested areas.

**Forest inventory:** an assessment of forest resources, including digitized maps and a database which describes the location and nature of forest cover (including tree size, age, volume and species composition) as well as a description of other forest values such as soils, vegetation and wildlife features.

**Forest land (Assessment Act):** land which has as its highest and best use the growing and harvesting of trees, including land which is being managed in accordance with a forest management plan approved under regulations, but does not include a farm.

**Forest land (Ministry of Forests):** provincial forests and other unalienated Crown lands for which the Ministry of Forests is responsible, including both forested lands and non-forested lands such as tundra, wetlands, rangelands, deserts, rock, and ice.

**Forest land (B.C. Assessment Authority):** land having as its highest and best use the growing and harvesting of trees.

**Forest landscape:** a portion of the land that the eye can see in one glance and in which the forest is the most dominant element.

**Forest licence:** a forest licence allows orderly timber harvest over a portion of a sustained yield management unit, and the timely reforestation of harvested areas according to a strategic resource management plan prepared by the Forest Service for each timber supply area. The licence has a term of 15 to 20 years, generally replaceable every five years (some are non-replaceable) and operating areas that shift over time. Once an area is harvested and reforested the licensee moves to another part of the timber supply area. A forest licence specifies an annual allowable cut, requires a management and working plan, and specified management activities.

**Forest management:** the practical application of scientific, economic and social principles to the administration and working of a forest for specified objectives. Particularly, that branch of forestry concerned with the overall administrative, economic, legal and social aspects and with the essentially scientific and technical aspects, especially silviculture, protection and forest regulation.

**Forest management cycle:** the phases that occur in the management of a forest including harvesting, site preparation, reforestation, and stand tending.

**Forest management plan:** a general plan for the management of a forest area, usually for a full rotation cycle, including the objectives, prescribed management activities and standards to be employed to achieve specified goals. Commonly supported with more detailed development plans.

**Forest mensuration:** the measurement of volume, growth and development of individual trees and stands, and the various products obtained from them.

**Forest officer:** a person employed by the B.C. Ministry of Forests who is designated by the minister, chief forester, or regional manager to be a forest officer, through name or title.

**Forest planning model:** an analytical model (usually computer-based) that successively harvests and grows collections of forest stands over a period of several decades according to specific data and management assumptions.

**Forest practice:** For the purpose of the Forest Practices Code of British Columbia Act means timber harvesting, road construction, road maintenance, road use, road deactivation, silviculture treatments, botanical forest product collecting, grazing, hay cutting, fire use, control and suppression and any other activity that is:

- a) carried out on land that is:
  - (i) Crown forest land;
  - (ii) range land, or;
  - (iii) private land that is subject to a tree farm licence or a woodlot licence, and
- b) carried out by:
  - (i) any person
    - (A) under an agreement under the Forest Act or Range Act;
    - (B) for a commercial purpose under the act or the regulations, or;
    - (C) to rehabilitate forest resources after an activity referred to in Clause A or B;
  - (ii) the government.

**Forest resources:** a defined term in the Forest Practices Code of British Columbia Act meaning resources and values associated with forests and range including, without limitation, timber, water, wildlife, fisheries, recreation, botanical forest products, forage, and biological diversity.

**Forest Practices Advisory Council (FPAC):** Cabinet may by regulation establish a Forest Practices Advisory Council to periodically review the Forest Practices Code and recommend changes.

**Forest Practices Board (FPB):** the Forest Practices Board is the "public watchdog" agency established under the Forest Practices Code of British Columbia Act to audit the activities of both the forest industry and the government.

**Forest Practices Code (FPC):** the Forest Practices Code is a term commonly used to refer to the Forest Practices Code of British Columbia Act, the regulations made by Cabinet under the act and the standards established by the chief forester. The term may sometimes be used to refer to field guides as well. It should be remembered that unlike the act, the regulations and standards, field guides are not legally enforceable.

**Forest profile:** the range of forest conditions that exists across the landscape, including such factors as timber species, quality, condition and age, location, elevation, topography, accessibility, and economic viability.

**Forest renewal:** the renewal of a tree crop by either natural or artificial means. Forest resources: a defined term in the Forest Practices Code of British Columbia Act meaning resources and values associated with forests and range including, without limitation, timber, water, wildlife, fisheries, recreation, botanical forest products, forage, and biological diversity.

**Forest Service road:** a road constructed, modified or maintained by the minister under the provisions of the Forest Act or declared a Forest Service road. Forest Service roads are used to provide access to managed forest land.

**Forest tree breeding:** the genetic study of trees to solve some specific problem or to produce a specially desired product.

**Forest tree improvement:** the control of parentage combined with other silvicultural activities (such as site preparation or fertilizing) to improve the overall yield and quality of products from forest lands.

**Forest type:** a group of forested areas or stands of similar composition (species, age, height, and stocking) which differentiates it from other such groups.

**Forest type labels:** the symbols which are used to code information about forest types on a forest cover map, such as site, disturbance, age and height class, species, stocking.

**Forest type lines:** lines on a map or aerial photo outlining forest types.

**Forest yield:** see Allowable Annual Cut.

**Forest yield regulation:** the administrative and technical process which facilitates yield control (regulation), often narrowly interpreted as a process that ensures regular and sustained forest yields.

**Forester:** a person engaged in the profession of forestry. In some countries the term is restricted to those who received formal post-secondary education in forestry or who possess the equivalent qualifications. A forester may or may not be a Registered Professional Forester, which is a legally-recognized title.

**Forestry:** the science, art and practice of managing and using for human benefit the natural resources that occur on and in association with forest lands.

**Fragmentation:** the process of transforming large continuous forest patches into one or more smaller patches surrounded by disturbed areas. This occurs naturally through such agents as fire, landslides, windthrow and insect attack. In managed forests timber harvesting and related activities have been the dominant disturbance agents.

**Free-growing stand:** Defined in the Forest Practices Code of British Columbia Act as a stand of healthy trees of a commercially valuable species, the growth of which is not impeded by competition from plants, shrubs or other trees.

**Free-growing assessment:** the determination for whether young trees have attained free- growing status.

**Free use permits:** an agreement entered into under Part 3, Division 8 of the Forest Act, which provides for the cutting and utilization of Crown timber for very specific purposes, free of stumpage assessment.

**Freshet:** high stream flow, usually confined to the stream channel and caused by a regularly recurring hydrological phenomenon (e.g., the snowmelt freshet) (regional term).

**Fruiting body:** the reproductive part of a fungus that contains or bears spores. Also known as a conk.

**Fry:** the young stage of fishes (i.e., less than one year old), particularly after the yolk sac has been absorbed.

**Fuelbreak:** an existing barrier or change in fuel type (to one that is less flammable than that surrounding it), or a wide strip of land on which the native vegetation has been modified or cleared, that act as a buffer to fire spread so that fires burning into them can be more readily controlled. Often selected or constructed to protect a high value area from fire.

**Fuel management:** the planned manipulation and/or reduction of living or dead forest fuels for forest management and other land use objectives (such as hazard reduction, silvicultural purposes, wildlife habitat improvement) by prescribed fire, mechanical, chemical or biological means and/or changing stand structure and species composition.

**Fuelwood:** trees used for the production of firewood logs or other wood fuel.

**Full bench cut:** forming the roadway entirely in cut.

**Full-tree harvesting:** a tree harvesting process that includes removing the trunk, branches and in some instances the roots from a forested site. In Canada this process is used to control root diseases.