

BEC-TREE Species Description: BWBSmk

Historically the forests of the Moist Cool Boreal White and Black Spruce biogeoclimatic unit (BWBSmk) were dominated by fire-origin seral forests. Pure or intermixed trembling aspen and hybrid white spruce stands were widespread on upland sites. Hybrid white spruce dominated stands were generally more common on lower to toe slopes and along riparian features, at higher elevations, or in stands that had escaped fire for 100 years or more. Lodgepole pine occasionally dominated stands on drier sites and on average to dry sites on the Liard plateau (i.e., old BWBSdk2). Balsam poplar was a common component of stands in lower slope positions and dominated stands along the low bench of larger water courses. Black spruce and to a lesser extent tamarack dominated forests of the extensive wetlands in lowland areas and on poorer upland sites.

Age class distribution as a % of total forest area [Source: VRIMS 2008]

| Stand age class | 7-9 natural forest | 7-9 harvested forest | 4-6 natural forest | 4-6 harvested forest | 1-3 natural forest | 1-3 harvested forest |
|------------------------|--------------------|----------------------|--------------------|----------------------|--------------------|----------------------|
| % of total forest area | 42 | 0 | 42 | 0 | 15 | 1 |

Tree species distribution in natural old/mature (age class 7-9) and natural immature (age class 4-6) as a % of the total natural old/mature and natural immature forest cover respectively [Source: VRIMS 2008]

| Species | Ac | At | Ep | L | PI | Sb | Sw |
|--|----|----|----|---|----|----|----|
| % of total natural old/mature (age class 7-9) forest cover | 2 | 13 | 1 | 1 | 12 | 46 | 23 |
| % of total natural immature (age class 4-6) forest cover | 2 | 21 | 5 | 2 | 14 | 44 | 10 |

Forest management practices of the 1960's to present have resulted in stand compositions that are similar to those on the upland portion of the natural landscape considering the concentration of harvest on spruce and aspen leading stands. The concentration of harvesting in purer conifer or broad-leaved stands means that less managed stands are intimate broadleaf-conifer mixtures. Trembling aspen also tends to be more dispersed and not in denser patches in coniferous harvested areas due to site preparation and brushing and weeding practices. Extensive harvesting on the large fluvial floodplains of the major rivers and often poor regeneration success has increased the amount of floodplain areas dominated by balsam poplar.

% species composition of post-harvested stands [Source: RESULTS 1988-2006]

| | BI | PI | S | Hardwoods |
|---------------------|----|----|----|-----------|
| % of harvested area | 0 | 5 | 48 | 47 |

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Note: The BWBSmk varies considerably from east to west. The eastern portion is dominated by extensive wetlands. The middle section has a mix of upland mixedwood forests, wetlands and riparian forests along the large rivers. The western portion in the mountain valleys and Liard plateau is primarily upland and riparian forests with fewer wetlands.