A summary of the FSC Group certification administered by the Nova Scotia Association for Woodland Certification for the year 2023-2024

Nova Scotia Association for woodland Certification (NSAWC) FSC® Program Public Summary

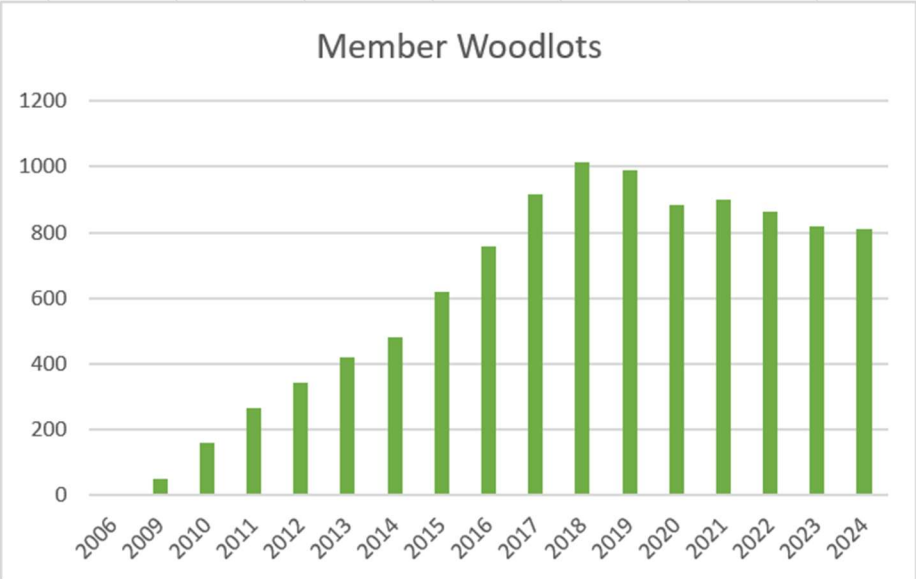
October 2024

Produced by NSLFFPA

Contents

Introduction

The following document provides a summary of the FSC Group certification program administered by the Nova Scotia Association for Woodland Certification (NSAWC) in Nova Scotia. The program is a voluntary program available to woodlot owners in Nova Scotia who are interested in managing their woodlots to high standards of environmental and social responsibility. The program has been in place since 2006. The current year has seen a leveling of the previous year's decline[1] with a slight uptick in total membership. The overall program is administered by NSAWC with regional service providers performing extension work and treatment monitoring. The regional managers make up the board of the NSAWC.

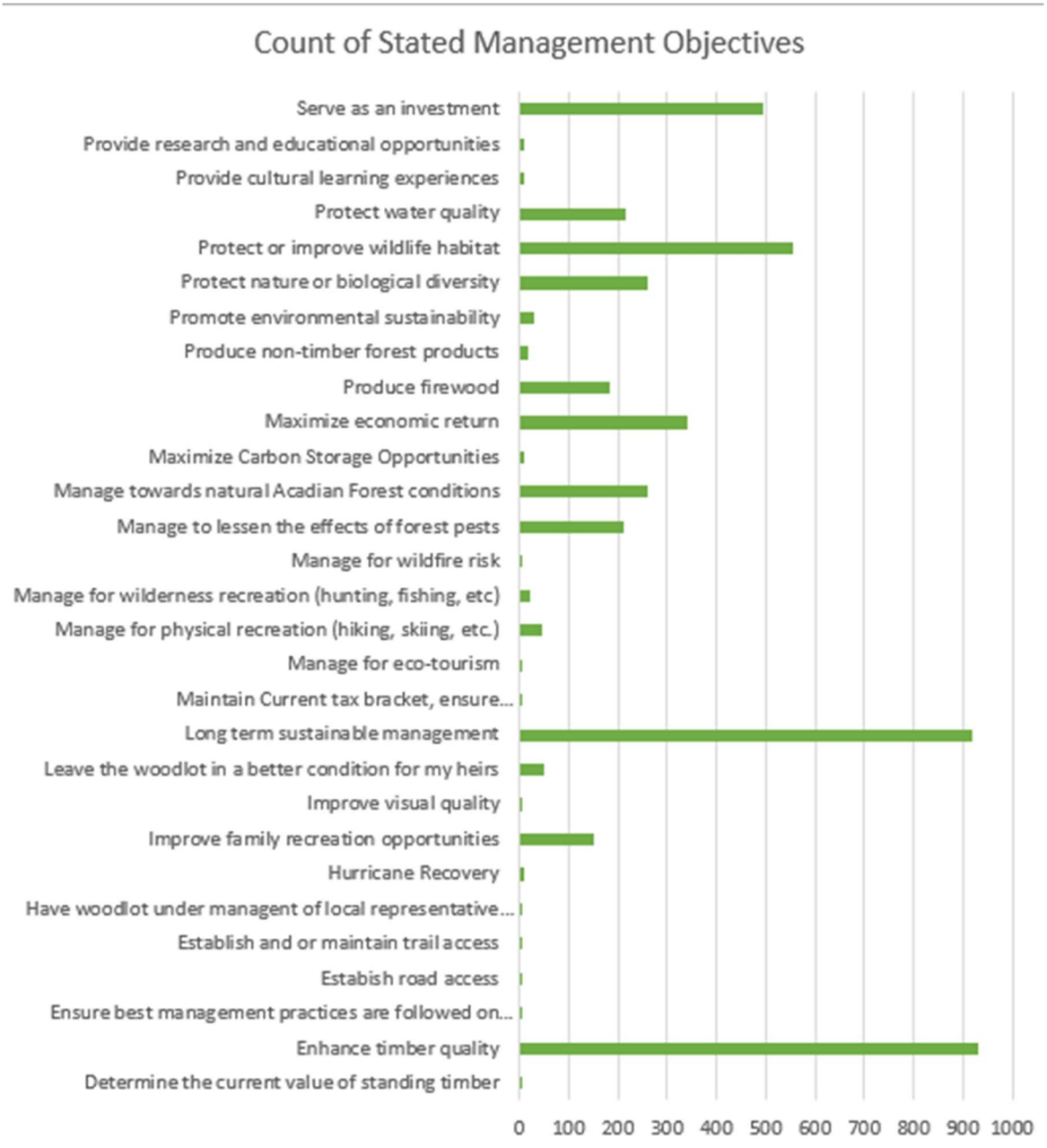


These service providers are Cape Breton Privateland Partnership (CBPP); Nova Scotia Landowners and Forest Fibre Producers Association (NSLFFPA) on the Eastern Mainland (Antigonish, Guysborough, Pictou); Federation of Nova Scotia Woodland Owners FNSWO) covering Central NS; and the Western Woodlot Services Coop (WWSC) in Western Nova Scotia.

[1] 2019/2020 experienced the first overall drop in total membership due to the expiry of the initial wave of 10-year-old management plans of which not all were renewed. The net difference of new plans to expiring plans has seen a steady state between 800 and 850 FMUs in recent years. There is a growing demand for FSC certification, and we expect an uptick over the coming year.

Management Objectives

Woodlot owner objectives are developed for each woodlot management plan in consultation with the woodlot owner. A summary of the objectives by woodlot is presented below (each woodlot can have multiple objectives). Most woodlot mgmt. plans have approximately 4 primary general objectives.

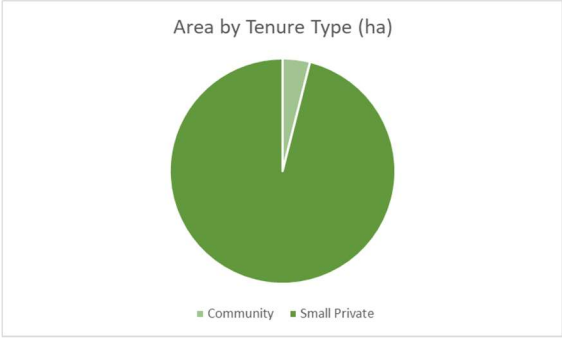


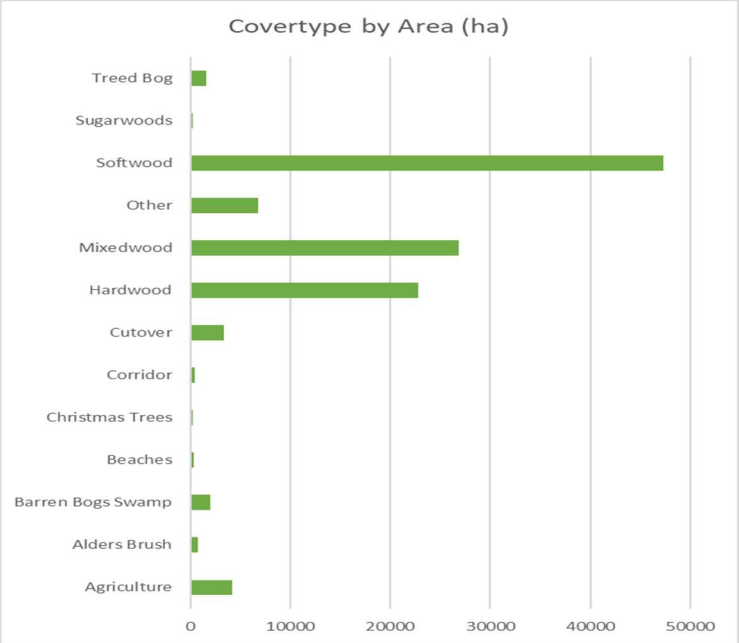
Landbase Description

The program currently contains a total of 57,946 ha of land within the scope of the 796 individual woodlot management plans. The program forest reflects the general forest characteristics of the area – largely softwood dominated, with a significant portion of mixedwood and hardwood forest.

Most of the woodlots in the program are relatively small, with an average size of 78 ha. Most woodlot owners own and manage one woodlot, while a few of our members have several woodlots that they manage.

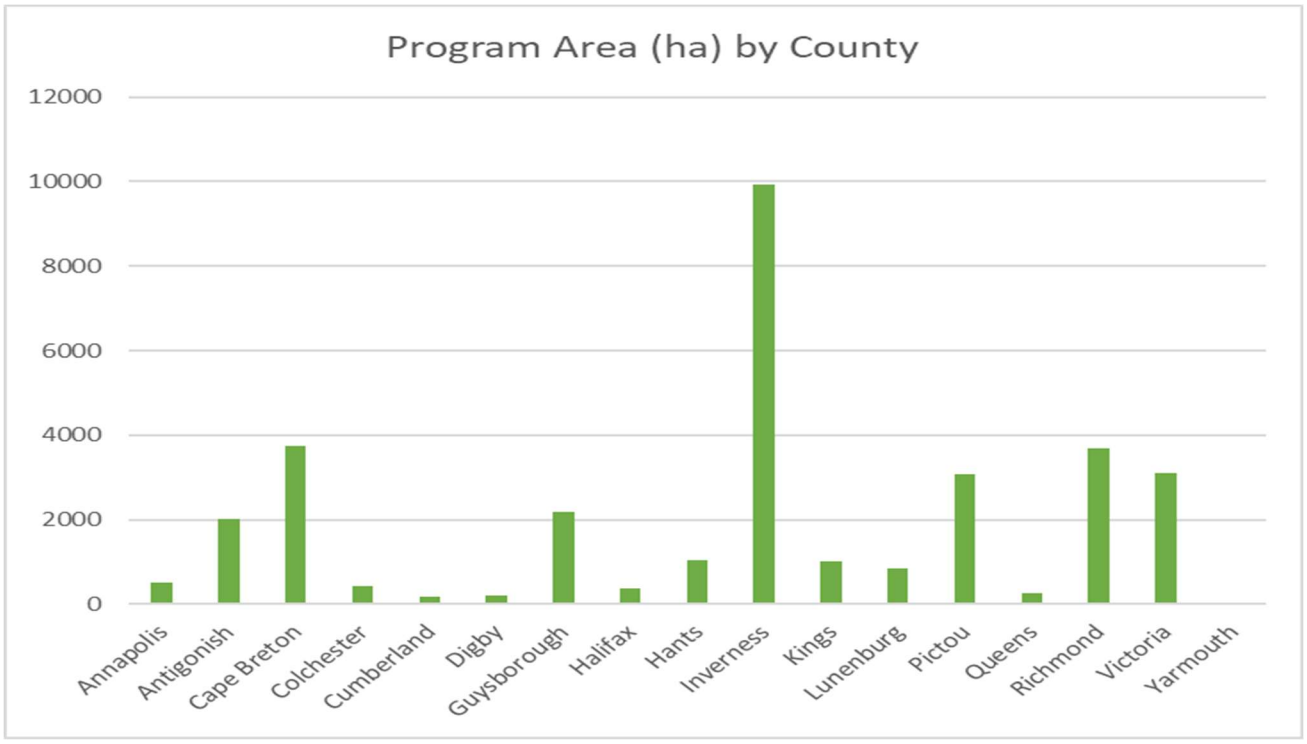
The program is made up primarily of individual woodlot owners, however there are also Community focused woodlots in the group (Pictou Landing First Nation, Bear River First Nation, and East Bay Area Community Council).





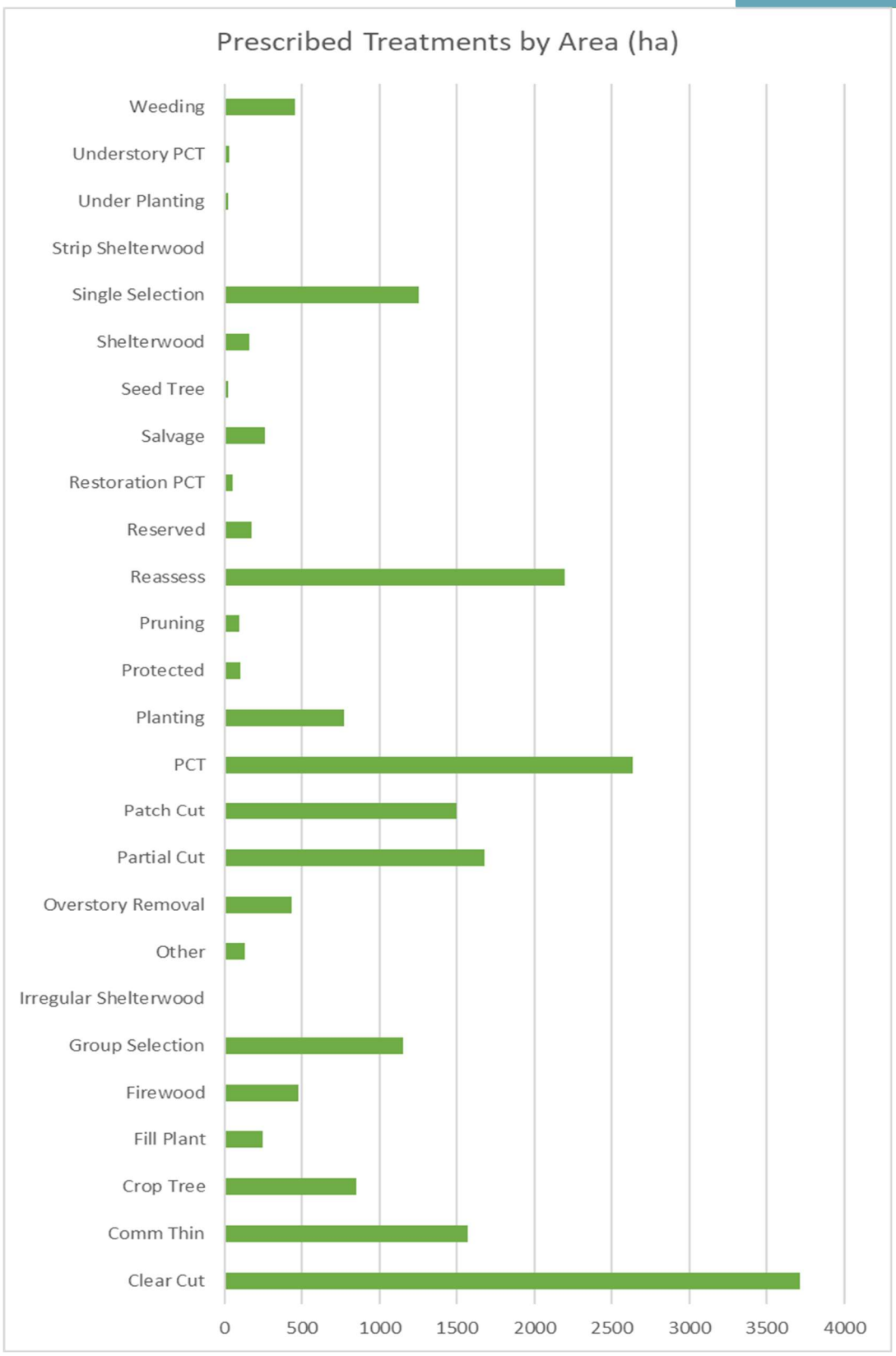
Program Distribution

The certificate has membership representation across the province with the bulk of active membership and treatment activity remaining in the East and Cape Breton especially. This can be attributed to the historical uptake in the East and the only active FSC sales market currently within the FSC chain of custody of the certificate through Port Hawkesbury Paper (PHP) for delivered primary pulpwood. Most of delivered private FSC wood to PHP was sourced on Cape Breton woodlots, with the remainder close by on the Eastern Mainland.



Silviculture Systems

All silviculture prescriptions are based on restoration of the Acadian Forest and meeting the individual woodlot owner's objective for their forest. Management prescriptions are developed using the provincial Ecological Landscape Classification (ELC) system and take into account the dominant Natural Disturbance Regime (NDR) for the site. A summary of prescribed treatments within the program is provided below.


Prescribed Treatments by Area (ha)
Weeding
Understory PCT
Under Planting
Strip Shelterwood
Single Selection
Shelterwood
Seed Tree
Salvage
Restoration PCT
Reserved
Reassess
Pruning
Protected
Planting
PCT
Patch Cut
Partial Cut
Overstory Removal
Other
Irregular Shelterwood
Group Selection
Firewood
Fill Plant
Crop Tree
Comm Thin
Clear Cut
0
500
1000
1500
2000
2500
3000
3500
4000

Rate of Annual Harvest Rationale

All harvesting treatments have been cruised to determine the expected volume that will be removed, based on:

a) Volume present today
b) Operational reductions
c) Prescribed removal percentage
d) Expected losses to insect and disease mortality

Since the management plans developed are for a period of 10 years, an average annual removal amount is calculated by dividing the total prescribed removal for the woodlot by 10. The program total prescribed removal amounts are provided below.

	Softwood Cords	Hardwood Cords
Total Prescribed Harvest	454,316	194,909
Annual Allowable Cut	45,431	19,490

Monitoring Forest Growth and Dynamics

On a five year interval, NSAWC examines the growth, harvest rates, and standing volume of woodlots that are part of its FSC program. This information is examined in relation to changes over time, as well as compared to woodlots that are not part of the program to determine whether there are any trends that can be found.

Primarily, the provincial permanent sample plot (PSP) information will be used for this information. This is a system of randomly sampled, permanent plots that have been developed throughout the province. This system has been in place since 1965 and is very useful for examining long-term trends in tree growth.

This exercise was last completed in 2016, and no significant difference was found between growth and removal rates within the program compared to provincial averages. Since the program is very new relative to forest growth cycles, this result is not unexpected.

NSAWC is currently in the process of developing a wood supply model capable of calculating sustainable wood supply for all woodlots in the program. When completed this will be used to help ensure harvest levels at the program level are sustainable.

Environmental Assessments and Safeguards

Prior to any field surveys being carried out, provincial surveys of any known species at risk habitat, significant eco-sites and other areas of ecological significance are examined. This information is verified

during the field assessment, and the local DNR biologists is consulted to assist in the development of any treatment or protection recommendations

Conservation Areas Framework

Pursuant to Criterion 6.4 inclusive, a conservation areas framework has identified 13.9% (8,266ha of total program area of 59,326ha) of the total certified landbase in some form of delineated conservation.

Conservation Area Value Description	Area (ha)	Total
Tolerant HW managed Commercial Thin	522	
Tolerant HW managed Single Selection	1332	
Barren Bogs Swamp	1750	
Treed Bog	1199	
Reserved	153	
SAR Area	529	
Of Concern	287	
Stream Buffers 20m	2181	
Cruise identified late successional (old growth potential)	313	
Total Conservation Area	**8266**	
Total Program Area		**59,326**
Percentage in Conservation Areas		**13.90%**

NSAWC FSC High Conservation Value Forest Framework Evaluation Summary

In 2018 NSAWC completed an evaluation of the Forest Stewardship Council (FSC) High Conservation Value Forest (HCVF) Framework (FSC-STD-CAN-Maritimes-SLIMF-2008) for applying management strategies and monitoring procedures to enhance or maintain regionally significant ecological values across the scope of the certificate region (Nova Scotia). A new HCVF framework is currently being developed, including an analysis for New Brunswick and PEI, in anticipation of a potential expansion of the certificate scope.

Using accessible data inventories of known values for the region, each value (or attribute) is linked to the closest corresponding HCVF framework criterion. Most of these attributes are associated with actual spatial (mapped) information. These attributes are intersected with each new applicant woodlot property boundaries and adjacent lands to identify any HCVF values with which to apply appropriate management strategies and monitor over time. Unmapped values and mapped values requiring additional confirmation of values are explored at the time of field cruise by trained field staff.

HCVF Framework Evaluation Summary

1. Reviewed available data sets which identify potential or actual ecological values.
    a. Determined which FSC HCVF Framework value and criteria each attribute best fits.
    b. Assigned HCVF = True to all attributes deemed to be hcvf

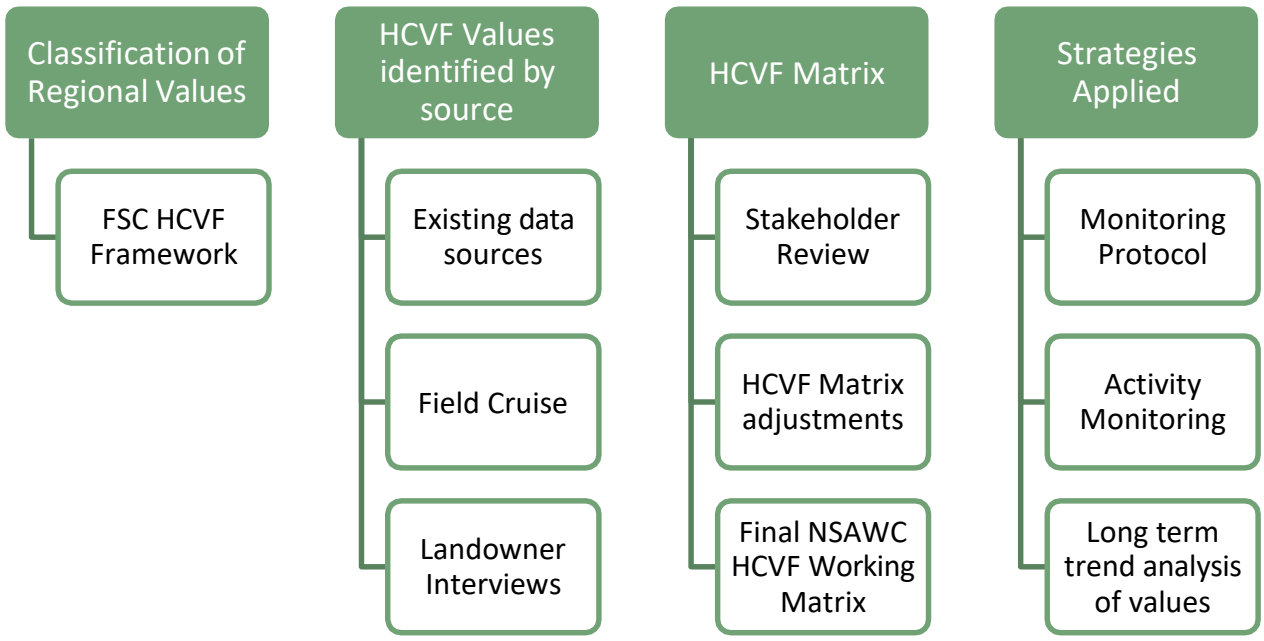
c. Assigned a strategy and monitoring procedure for each attribute. A 'comment' field is also included which is edited on a case by case basis.
d. GIS intersects of all demonstrated data sets are performed on each new applicant woodlot to identify hcvf and other significant ecological values and their associated attributes. Intersect results are linked to hcvf matrix strategies and monitoring procedures. Records are stored in a database for trend analysis, public summary reporting, long term monitoring and trend analysis.
e. Unmapped values are included in the HCVF Matrix as field cruise identification where the value can only be identified and verified through a field cruise (and landowner interviews).

2. Reviewed federal and provincial species at risk listings to determine if there are any values not currently identified through existing data inventories.
3. Stakeholder review. Evaluation was sent out to those representing authority on subject and / or primary stakeholder interest.
4. Training of field staff and management plan developers
5. Present evaluation results to membership and include in public summary.

NSAWC HCVF Framework evaluation source data.

Data Source	Description
HCVF Matrix Definitions	Definitions for main matrix fields.
HCVF Matrix	High Conservation Value Forest Assessment Framework Analysis, NSAWC September 15, 2014. Non -GIS identifiable values are listed here.
HCVF GIS Master	Final GIS intersect Table. Summary of all individual GIS matrix tables into one listing. Best place for summary of sigeco, sighab, rlul data sets.
Unmapped Habitat Values	Filtered from 'Flora and Fauna Matrix' representing Federal species with COSEWIC status which are not available on existing NSAWC GIS data sets.
SigEco Matrix	Significant Ecosites GIS attribute data (DNR download)
Souf Matrix	Significant Old or Unique Forests. Based on aerial photo analysis interpreted age class structure. Efficacy largely questioned by DNR staff but found to be effective as a potential flag for an area.
SigHab SAR Matrix	Significant Wildlife Habitat GIS attribute data (DNR download)
RLUL Matrix	Restricted and Limited Use Land Database. Land that is protected or limited in use for conservation, ecological, resource management or heritage purposes. (DNR download).
NS_matrix_tier1	Derived from the Matrix Forest Block GeoSpatial Data (Nature Conservancy download)
Flora and Fauna Matrix	Provincial and Federal SAR list comparison and sort. Purpose is to compare available GIS data used in NSAWC mgmt plan development system with provincial and federal lists to identify non-mapped, potentially influenced by forestry activities in Eastern Nova Scotia. (Federal SARA and COSEWIC listings)
Matrix Forest Full	Matrix Forest Block GeoSpatial Data (Nature Conservancy download)
ACCDC Data	

NSAWC HCVF Framework evaluation workflow.



HCVF Framework Master Values Reference List; Value by Strategy.

This is the list of known identifiable values within the scope of the certificate. The values by strategy and data source which may occur on member lots. The 'Data_Source' column lists the source GIS layer or says 'Field Cruise', as identified during the field assessment for the management plan.

Province	ID	HCValue	HCV_Criteria	ValueID	HCV	Strategy	Comment	Data_Source
NS	100	Alkaline bog	12	101.1	FALSE	Apply adequate buffer where feasible	Not rare but value may be affected by management activities	SigEco
NS	101	Alkaline fen	12	101.1	FALSE	Apply adequate buffer where feasible	Not rare but value may be affected by management activities	SigEco
NS	102	Beach/dune	12	201.1	FALSE	Not applicable	Not rare and not affected by management activities	SigEco
NS	103	Beech forest	8	8.3	TRUE	Protected or extremely light selection to maintain stand condition	Disease free (smooth) at the stand level (not individual stems)	SigEco
NS	104	Calcareous forest	8	101.1	FALSE	Assessment for machine operability and worker safety	under represented in the protected areas system. Primarily found on privateland.	SigEco
NS	105	Cliff	8	201.1	FALSE	Not applicable	Not rare and not affected by management activities	SigEco
NS	106	Coast tolerant hardwood	8	8.3	TRUE	Protected or extremely light selection to maintain stand condition where appropriate	Fundy and Atlantic Coast only.	SigEco
NS	107	Coast tolerant hardwood	10	10.3	TRUE	Protected or extremely light selection to maintain stand condition where appropriate	Fundy and Atlantic Coast only.	SigEco
NS	108	Coastal barren	12	101.1	FALSE	Apply adequate buffer where feasible; Do not travel through	Not rare but value may be affected by management activities	SigEco
NS	109	Coastal bog/barren	12	101.1	FALSE	Apply adequate buffer where feasible	Not rare but value may be affected by management activities	SigEco
NS	110	Coastal cliff	12	201.1	FALSE	Not applicable	Not rare and not affected by management activities	SigEco
NS	111	Coastal Ledge	12	201.1	FALSE	Not applicable	Not rare and not affected by management activities	SigEco
NS	112	Coastal open bog	12	201.1	FALSE	Apply adequate buffer where feasible	Not rare but value may be affected by management activities	SigEco
NS	113	Coastal open fen	12	201.1	FALSE	Apply adequate buffer where feasible	Not rare but value may be affected by management activities	SigEco
NS	114	Coastal shrub bog	12	201.1	FALSE	Apply adequate buffer where feasible	Not rare but value may be affected by management activities	SigEco
NS	115	Coastal shrub fen	12	201.1	FALSE	Apply adequate buffer where feasible	Not rare but value may be affected by management activities	SigEco
NS	116	Coastal treed bog	12	201.1	FALSE	Apply adequate buffer where feasible	Not rare but value may be affected by management activities	SigEco
NS	117	Coastal treed fen	12	201.1	FALSE	Apply adequate buffer where feasible	Not rare but value may be affected by management activities	SigEco
NS	118	Erosional seabluff	15	15.1	TRUE	Buffer appropriate to site conditions	Maintain existing vegetation to prevent or prolong erosion.	SigEco
NS	119	Estuarine flat	12	201.1	FALSE	Apply adequate buffer where feasible	Not rare but value may be affected by management activities	SigEco
NS	120	Estuary complex	12	201.1	FALSE	Apply adequate buffer where feasible	Not rare but value may be affected by management activities	SigEco
NS	121	Fen-Bog complex	12	101.1	FALSE	Apply adequate buffer where feasible	Not rare but value may be affected by management activities	SigEco
NS	122	Floodplain forest	12	12.3	TRUE	Protected or extremely light selection to maintain stand condition where appropriate	Floodplains can support particularly rich ecosystems, both in quantity and diversity. Significant for seasonal flooding and erosion control.	SigEco
NS	123	Hemlock floodplain	8	8.3	TRUE	Protected or extremely light selection to maintain stand condition where appropriate	Floodplains can support particularly rich ecosystems, both in quantity and diversity. Significant for seasonal flooding and erosion control.	SigEco

NS	124	Hemlock floodplain	10	10.3	TRUE	Protected or extremely light selection to maintain stand condition where appropriate	Floodplains can support particularly rich ecosystems, both in quantity and diversity. Significant for seasonal flooding and erosion control.	SigEco
NS	125	Hemlock floodplain	12	12.3	TRUE	Protected or extremely light selection to maintain stand condition where appropriate	Floodplains can support particularly rich ecosystems, both in quantity and diversity. Significant for seasonal flooding and erosion control.	SigEco
NS	126	Hemlock floodplain	13	13.3	TRUE	Protected or extremely light selection to maintain stand condition where appropriate	Floodplains can support particularly rich ecosystems, both in quantity and diversity. Significant for seasonal flooding and erosion control.	SigEco
NS	127	Hemlock forest	8	8.3	TRUE	Reserved with selection mgmt where appropriate	Not on slopes	SigEco
NS	128	Highland barren	8	201.1	FALSE	Not applicable	Not rare and not affected by management activities	SigEco
NS	129	Inland barren	8	101.1	FALSE	Apply adequate buffer where feasible	Not rare but value may be affected by management activities	SigEco
NS	130	Inland bog/barren	12	101.1	FALSE	Apply adequate buffer where feasible	Not rare but value may be affected by management activities	SigEco
NS	131	Inland Cliff	8	201.1	FALSE	Not applicable	Not rare and not affected by management activities	SigEco
NS	132	Jackpine forest	8	8.3	TRUE	Natural (not planted); Depends on location; site conditions; development stage; other To follow up with a request to DNR for full guidelines or site specific confirmation. Regional Services first point of contact. Email to Pneilly, Sean B.	Field Cruise Confirmation. Field Cruise additional identification	SigEco
NS	133	Karst	8	101.1	FALSE	Assessment for machine operability and worker safety	Not rare but value may be affected by management activities	SigEco
NS	134	Karst conifer fore	8	101.1	FALSE	Assessment for machine operability and worker safety	Not rare but value may be affected by management activities	SigEco
NS	135	Karst hardwood for	8	101.1	FALSE	Assessment for machine operability and worker safety	Not rare but value may be affected by management activities	SigEco
NS	136	Karst shrubland	8	201.1	FALSE	Not applicable	Not impacted by Forest operations	SigEco
NS	137	Lagoon	12	201.1	FALSE	Not applicable	Not impacted by Forest operations	SigEco
NS	138	Lake beach	12	201.1	FALSE	Not applicable	Not impacted by Forest operations	SigEco
NS	139	Lake Island	12	201.1	FALSE	Not applicable	Not impacted by Forest operations	SigEco
NS	140	Mountain Cove	12	12.3	TRUE	Selection mgmt	Also known as Cove Forest. Steep hill terrain. 3 sides to a bench. Contains a unique micro-climate which influences vegetation and development. Sheltered on 3 sides.	SigEco
NS	141	Offshore Island	12	201.1	FALSE	Not applicable	Not impacted by Forest operations	SigEco
NS	142	Oxbow lake	12	201.1	FALSE	Not applicable	Not impacted by Forest operations	SigEco
NS	143	red oak forest	8	8.3	TRUE	Reserved with selection mgmt where appropriate	Uncommon in Eastern NS	SigEco
NS	144	red oak forest	10	10.3	TRUE	Reserved with selection mgmt where appropriate; Dependent on region.	Uncommon in Eastern NS	SigEco
NS	145	Red pine forest	8	8.3	TRUE	Reserved with mgmt strategy to move stand along successional pathway, possibly including underplanting with rP.	Natural (not planted)	SigEco
NS	146	Red pine forest	10	10.3	TRUE	Reserved with mgmt strategy to move stand along successional pathway, possibly including underplanting with rP.	Natural (not planted)	SigEco
NS	147	River canyon	12	201.1	FALSE	Not applicable	Not impacted by Forest operations	SigEco
NS	148	rM floodplain	8	8.3	TRUE	Protected or extremely light selection to maintain stand condition where appropriate	Floodplains can support particularly rich ecosystems, both in quantity and diversity. Significant for seasonal flooding and erosion control.	SigEco

NS	149	rM floodplain	10	10.3	TRUE	Protected or extremely light selection to maintain stand condition where appropriate	Floodplains can support particularly rich ecosystems, both in quantity and diversity. Significant for seasonal flooding and erosion control.	SigEco
NS	150	rM floodplain	12	12.3	TRUE	Protected or extremely light selection to maintain stand condition where appropriate	Floodplains can support particularly rich ecosystems, both in quantity and diversity. Significant for seasonal flooding and erosion control.	SigEco
NS	151	rM floodplain	13	13.3	TRUE	Protected or extremely light selection to maintain stand condition where appropriate	Floodplains can support particularly rich ecosystems, both in quantity and diversity. Significant for seasonal flooding and erosion control.	SigEco
NS	152	Salt Marsh	12	201.1	FALSE	Not applicable	Not impacted by Forest operations	SigEco
NS	153	Sand barren	8	201.1	TRUE	Not applicable	Not impacted by Forest operations	SigEco
NS	154	Shrub fen complex	12	201.1	FALSE	Not applicable	Not impacted by Forest operations	SigEco
NS	155	sM floodplain	10	10.3	TRUE	Protected or extremely light selection to maintain stand condition where appropriate	Floodplains can support particularly rich ecosystems, both in quantity and diversity. Significant for seasonal flooding and erosion control.	SigEco
NS	156	sM floodplain	12	12.3	TRUE	Protected or extremely light selection to maintain stand condition where appropriate	Floodplains can support particularly rich ecosystems, both in quantity and diversity. Significant for seasonal flooding and erosion control.	SigEco
NS	157	sM floodplain	13	13.3	TRUE	Protected or extremely light selection to maintain stand condition where appropriate	Floodplains can support particularly rich ecosystems, both in quantity and diversity. Significant for seasonal flooding and erosion control.	SigEco
NS	158	Talus slope	8	201.1	TRUE	Not applicable	Not impacted by Forest operations	SigEco
NS	159	Tidal flats	12	201.1	FALSE	Not applicable	Not impacted by Forest operations	SigEco
NS	160	Unique lake	12	201.1	FALSE	Apply adequate buffer when required	Not impacted by Forest operations	SigEco
NS	161	Vernal pond	12	12.3	TRUE	Appropriate buffer in event of operations	Vernal pools are small, shallow wetlands that lack permanent inlet or outlet streams and often dry out in the summer. They provide critical breeding habitat for frogs, salamanders, insects and fairy shrimp, and feeding and drinking sites for birds, mammals, turtles and otherwildlife.	SigEco
NS	162	White spruce dune	8	201.1	TRUE	Protected	Rare; most have heavily impacted; erosion control; stabilization of dunes.	SigEco
NS	163	migratory bird	3	3.1	TRUE	Follow appropriate DNR Guidelines	Habitat maintenance and seasonal considerations	SigHab
NS	164	deer wintering	1	101.2	FALSE	Follow appropriate DNR Guidelines		SigHab
NS	165	moose wintering	3	101.2	FALSE	Follow appropriate DNR Guidelines	Identifies Cape Breton only	SigHab
NS	166	of concern	4	4.1	TRUE	Follow appropriate DNR Guidelines	Species and Strategy must be verified by regional DNR Wildlife biologist.	SigHab
NS	167	other habitat	1	101.2	FALSE	Follow appropriate DNR Guidelines	Species and Strategy must be verified by regional DNR Wildlife biologist.	SigHab
NS	168	species at risk	1	1.1	TRUE	Follow appropriate DNR Guidelines	Species and Strategy must be verified by regional DNR Wildlife biologist.	SigHab
NS	169	Large Intact Forest	7	7.1	TRUE	Clearcut harvest scheduled for areas > than 30 ha will have a strategy for maintaining interconnectivity of the matrix forest. Prior to any new road construction, a needs assessment is carried out to ensure the road is required and impact is minimized.	The property falls within a designated Large Intact Forest Zone. This is a landscape level conservation value targeted at maintaining forest connectivity.	Large Intact Forest
NS	170	Designated Provincial Parks and Park Reserve	6	6.1	TRUE	Contact conservation area land manager to ensure property boundaries are accurate.	Adjancey to value identified by appying 30m mapping buffer to intersect private woodlot(s).	RLUL
NS	171	Protected Beaches under the Beaches Protecti	6	201.1	FALSE	Protected area	Existing Protection	RLUL
NS	172	Wilderness Area	6	6.1	TRUE	Contact conservation area land manager to ensure property boundaries are accurate.	Adjancey to value identified by appying 30m mapping buffer to intersect private woodlot(s).	RLUL

NS	173	Areas under the Special Places Act	6	6.1	TRUE	Contact conservation area land manager to ensure property boundaries are accurate.	Adjancey to value identified by appying 30m mapping buffer to intersect private woodlot(s).	RLUL
NS	174	Sites of Ecological Significance / IBP sites	6	6.1	TRUE	Contact conservation area land manager to ensure property boundaries are accurate. If only mapped on crown then Requires Buffer for intersect on private (30m)	Adjancey to value identified by appying 30m mapping buffer to intersect private woodlot(s).	RLUL
NS	175	Provincial Wildlife Management Areas	6	6.1	TRUE	Contact conservation area land manager to ensure property boundaries are accurate.	Adjancey to value identified by appying 30m mapping buffer to intersect private woodlot(s).	RLUL
NS	176	Provincial Game Sanctuaries	6	6.1	TRUE	Contact conservation area land manager to ensure property boundaries are accurate.	Adjancey to value identified by appying 30m mapping buffer to intersect private woodlot(s).	RLUL
NS	177	National Wildlife Areas	6	6.1	TRUE	Contact conservation area land manager to ensure property boundaries are accurate.	Adjancey to value identified by appying 30m mapping buffer to intersect private woodlot(s).	RLUL
NS	178	National Historic Sites and Parks	6	6.1	TRUE	Contact conservation area land manager to ensure property boundaries are accurate.	Adjancey to value identified by appying 30m mapping buffer to intersect private woodlot(s).	RLUL
NS	179	National Parks and Adjuncts	6	6.1	TRUE	Contact conservation area land manager to ensure property boundaries are accurate.	Adjancey to value identified by appying 30m mapping buffer to intersect private woodlot(s).	RLUL
NS	180	National Migratory Bird Sanctuaries	6	6.1	TRUE	Designate area occurring on private certified as protected in management planning.		RLUL
NS	181	Designated Water Supply Areas	13	13.2	TRUE	When harvest is scheduled, automatically triggers site inspection.		RLUL
NS	182	Natural Watershed Municipal Surface Water Su	13	13.2	TRUE	When harvest is scheduled, automatically triggers site inspection.		RLUL
NS	183	Municipal Water Supply Areas	13	13.2	TRUE	When harvest is scheduled, automatically triggers site inspection.	Harmony / Camden area of Truro	RLUL
NS	184	Operational Non-Designated Parks and Reserve	6	101.3	FALSE	Contact area land manager to ensure property boundaries are accurate. If only mapped on crown then Requires Buffer for intersect on private (30m)	Adjancey to value identified by appying 30m mapping buffer to intersect private woodlot(s).	RLUL
NS	185	Non-Designated Rail Corridors	6	101.3	FALSE	Manage for aesthetics where feasible within 30m of active or planned public trails		RLUL
NS	186	Nature Conservancy of Canada Lands	6	6.1	TRUE	Identify and maintain protected status	Adjancey to value identified by appying 30m mapping buffer to intersect private woodlot(s).	RLUL
NS	187	Ramsar Wetland Sites	6	6.1	TRUE	Designate or maintain existing protected status.	Adjancey to value identified by appying 30m mapping buffer to intersect private woodlot(s).	RLUL
NS	188	Eastern Habitat Joint Venture Lands	6	6.1	TRUE	Contact conservation area land manager to ensure property boundaries are accurate. If only mapped on crown then Requires Buffer for intersect on private (30m)	Adjancey manager value identified by appying 30m mapping buffer to woodlot(s).	RLUL
NS	189	Trails Act Lands	6	201.1	FALSE	Manage for aesthetics where feasible within 30m of active or planned public trails	Adjancey feasible value identplannedied by appying trails mapping woodlot(s).	RLUL
NS	190	First Nations Reserve Lands	18	18.1	TRUE	Contact conservation area land manager to ensure property boundaries are accurate. If only mapped on crown then Requires Buffer for intersect on private (30m)	Adjancey manager value identified by appying 30m mapping buffer to woodlot(s).	RLUL
NS	191	Flight 111 Act	6	201.1	FALSE			RLUL
NS	192	Peggy's Cove Preservation Area	6	201.1	FALSE		Adjancey to value identified by appying 30m mapping buffer to intersect private woodlot(s).	RLUL
NS	193	Pipeline Corridor	9	101.3	FALSE	Notify pipeline operators and establish appropriate buffer and crossing requirements if applicable.	Adjancey to value identified by appying 30m mapping buffer to intersect private woodlot(s).	RLUL
NS	194	Canadian Heritage River	6	6.1	TRUE	When harvest is scheduled, automatically triggers site inspection.	Adjancey to value identified by appying 30m mapping buffer to intersect private woodlot(s).	RLUL

NS	195	Parkways	6	201.1	FALSE		Only Fortress Louisbourg and Peggy's Cove have Designation	RLUL
NS	196	Significant old or unique forest	8	8.1	FALSE	All sites are field verified. Souf layer known to be innacurate but raises potential in area	Adjancey verified value ident souf layer known to be innacurateied by appying area mapping woodlot(s).	SOUF
NS	197	Significant old or unique forest	9	9.2	FALSE	All sites are field verified. Souf layer known to be innacurate but raises potential in area	Adjancey verified value ident souf layer known to be innacurateied by appying area mapping woodlot(s).	SOUF
NS	198	Moose Pellet sightings	1	1.2	FALSE	Combine pellet sightings records with field verification of additional habitat features (wet features / mature sw cover) to implement bmp.	1km radius applied to known pellet and / or actual moose sighting	Moose
NS	199	Sites of Historical Significance	18	18.3	TRUE	Implement adequate buffer to protect the site and prevent erosion.	Cemetaries, pioneer markings, significant sites identified through field cruise and / or landowner interviews	Field Cruise
NS	200	Primordial Forest	8	8.5	TRUE	Protected	Not known to exist; old growth potential can be further assessed when noted.	Field Cruise
NS	201	Tolerant (hw or sw) late successional mature forest communities	8	8.2	TRUE	No treatment or Maintain or enhance value through selection management	Typically under-represented in age-class distribution and successional stage distribuiton by Ecodistrict. Diminishing Value	Field Cruise
NS	203	FEC: Rare or unique wet forest types	12	12.2	TRUE	Protected	Cedar.	Field Cruise
NS	204	Tolerant (hw or sw) late successional mature forest communities	8	9.3	TRUE	No treatment or Maintain or enhance value through selection management	Typically under-represented in age-class distribution and successional stage distribuiton by Ecodistrict. Diminishing Value	Field Cruise
NS	205	Tolerant (hw or sw) late successional mature forest communities	8	10.2	TRUE	No treatment or Maintain or enhance value through selection management	Typically under-represented in age-class distribution and successional stage distribuiton by Ecodistrict. Diminishing Value	Field Cruise
NS	206	Landowner specific objectives and field assessment of overlapping values. Concentration areas	19	19.1	TRUE	Case by case assessment		Field Cruise
NS	208	BFL	1	1.3	TRUE	Apply adequate buffer when harvest is scheduled	Endangered in Nova Scotia. Occurrence to be verified.	BFL
NS	209	Lynx Buffer	1	1.4	TRUE	Intact travel corridors are retained on harvest clearcut areas >10ha.	Canada lynx (endangered) foraging habitat which cycles with Snowshoe hare populations (primary food source). The lynx roam off highland areas as the hares decline. If no foraging wetlands identified, no additional BMPs recommended	Lynxbuffer
NS	210	Seepage and Springs	10	10.3	TRUE	Selection mgmt. and or adequate forest buffer.	High biodiversity value.	Field Cruise
NS	211	Black Ash	8	8.3	TRUE	Protect	Rare	ACCDC
NS	214	Blanding's Turtle - Nova Scotia pop.	1	1.1	TRUE	Follow appropriate DNR Guidelines		
NS	215	Seepage and Springs	12	12.3	TRUE	Selection mgmt.	High biodiversity value.	Field Cruise
NS	216	Seepage and Springs	13	13.3	TRUE	Selection mgmt.	High biodiversity value.	Field Cruise
NS	217	Considered protected	6	6.1	TRUE	Contact area land manager to ensure property boundaries are accurate.	Result is from 30m buffer applied to Protected areas mapping	Protected Areas
NS	218	Designated	6	6.1	TRUE	Contact area land manager to ensure property boundaries are accurate.	Result is from 30m buffer applied to Protected areas mapping	Protected Areas
NS	219	Downy Rattlesnake-Plantain	1	1.1	TRUE	avoid rutting; avoid acitivities that may reduce soil nutrient richness; avoid intensive harvesting (>30%)	mesotrophic to rich soil under mature forest in shade	ACCDC

NS	220	Eastern Ribbonsnake - Atlantic pop.	1	1.1	TRUE	Avoid overstory removal on known hibernacula, and avoid site disturbance during spring and fall if possible.	Travels to and from hibernation sites - up to 100m from lakeshore/watercourses in spring and late fall.	ACCDC
NS	221	Eastern White Cedar	8	8.3	TRUE	Protect	Rare	ACCDC
NS	222	Fisher	1	1.1	TRUE	Selection Mgmt at most	Protected	ACCDC
NS	223	IFL Class1000 - 10000 ha	7	7.1	TRUE	Clearcut harvest scheduled for areas > than 10 ha will have a strategy for maintaining interconnectivity of the matrix forest. Prior to any new road construction, a needs assessment is carried out to ensure the road is required and impact is minimized.	The property falls within a designated Large Intact Forest Zone. This is a landscape level conservation value targeted at maintaining forest connectivity.	Large Intact Forest
NS	224	IFL Class10000 - 50000 ha	7	7.1	TRUE	Clearcut harvest scheduled for areas > than 10 ha will have a strategy for maintaining interconnectivity of the matrix forest. Prior to any new road construction, a needs assessment is carried out to ensure the road is required and impact is minimized.	The property falls within a designated Large Intact Forest Zone. This is a landscape level conservation value targeted at maintaining forest connectivity.	Large Intact Forest
NS	225	IFL Class500 - 1000 ha	7	7.1	TRUE	Clearcut harvest scheduled for areas > than 10 ha will have a strategy for maintaining interconnectivity of the matrix forest. Prior to any new road construction, a needs assessment is carried out to ensure the road is required and impact is minimized.	The property falls within a designated Large Intact Forest Zone. This is a landscape level conservation value targeted at maintaining forest connectivity.	Large Intact Forest
NS	226	Marsh	12	201.1	TRUE	Apply adequate buffer	Wetlands of special importance	SigWetlands
NS	227	Swamp	12	201.1	TRUE	Apply adequate buffer	Wetlands of special importance	SigWetlands
NS	228	Southern Flying Squirrel	1	1.1	TRUE	Require vertical structure for mobility and shelter for foraging, mast trees for food, and cavities for denning.	Retain diversity of species and ages classes, including mature trees. Retain mast trees (oak, beech Witch hazel), and large snags/cavity trees.	ACCDC
NS	229	Olive-sided Flycatcher	1	1.1	TRUE	Maintain emergent spruce and snags.	Requires emergent spruce and spruce snags for foraging and singing.	ACCDC
NS	231	BufferZone0	1	1.1	TRUE	Follow DNR guidelines.	This shows core stream habitat with now buffer.	Wood Turtle Buffers
NS	232	BufferZone20	1	1.1	TRUE	Follow DNR guidelines.	This shows standard 20m buffer applicable all seasons.	Wood Turtle Buffers
NS	233	BufferZone100	1	1.1	TRUE	Follow DNR guidelines.	Applicable buffer for April, May & October	Wood Turtle Buffers
NS	234	BufferZone150	1	1.1	TRUE	Follow DNR guidelines.	Applicable buffer for June to September	Wood Turtle Buffers
NS	235	BufferZone200	1	1.1	TRUE	Follow DNR guidelines.	Applicable buffer for forest roads and landings construction.	Wood Turtle Buffers

HCVF Program Summary of Results

This is the list of values identified on management planning within the current Group Certified Landbase.

High Conservation Value Occurrence – Data Source and Value	Sum of Hectares
	11252.97073
Areas under the Special Places Act	0.626227343
Black Ash	
Canadian Heritage River	39.29523828
Designated Provincial Parks and Park Reserve	4.054053701
Designated Water Supply Areas	710.7875633
Eagle Nest	
First Nations Reserve Lands	187.7067527
Hemlock forest	17.61469586
Large Intact Forest	8070.14526
Moose Pellet sightings	0.014707737
National Historic Sites and Parks	5.339129284

Natural Watershed Municipal Surface Water Su	2104.608618
of concern	7.042860396
Sensitive, Of Concern	
sM floodplain	21.02075322
species at risk	28.02550088
Vernal pond	0.303921888
Wilderness Area	56.38544909
BFL	
BFL	
Field Cruise	
Black Ash	
Hemlock forest	
Mid - late successional tolerant hw	
Tolerant (hw or sw) late successional forest communities	
Tolerant (hw or sw) late successional mature forest communities	
Vernal pond	
Moose	
Moose Pellet sightings	
NSmatrixForest	**83.83596283**
Large Intact Forest	83.83596283
RLUL	**2.110589877**
Canadian Heritage River	1.185218979
Designated Provincial Parks and Park Reserve	0.252914008
Municipal Water Supply Areas	
National Wildlife Areas	
Natural Watershed Municipal Surface Water Su	0.67245689
Wilderness Area	
SigEco	
Coastal treed bog	
SigEcosites	
Hemlock floodplain	
Hemlock forest	
red oak forest	
Red pine forest	
Vernal pond	
Significant Ecosite	
Alkaline bog	**503.0037432**
Alkaline fen	2.546263424
Beech forest	17.42397861
Calcareous forest	4.441425464
Erosional seabluff	208.9771978
Hemlock floodplain	0.815754135
Hemlock forest	22.37469214
sM floodplain	13.1312497
Vernal pond	210.899382
White spruce dune	1.165485653
Significant Habitat	21.22831422
deer wintering	**6749.245145**
Lynx Buffer	
migratory bird	6203.032589
of concern	59.44900152
Other Habitat	161.7739908
species at risk	12.97197027
Significant Old or Unique Forest	312.0175929
MCDE	
Wood Turtle Buffers	
BufferZone200	
Grand Total	
	18591.16617

Monitoring

The NSAWC implements active and forest treatment monitoring assessments to observe and ensure

best forest management practices, health and safety practices and adherence to applicable regulations. Landowners are required to inform the group managers upon planned activity in order to schedule on-site monitoring assessments. Scheduling permitting, site visits are arranged for as many commercial harvesting operations as possible, with on-site inspections performed, including health and safety inspections when workers are on-site.

Each individual assessment is catalogued and tracked in the system database for identification of CARs, observations and a summary of the group totals. When workers are found on-site, health and safety inspections are also performed and tracked in the system database.

Frequency of occurrences are tracked to identify potential common deficiencies or infractions at any level for future education and prevention.

Monitoring results for 2023/2024 are presented in the tables below.

Inspection Results Full

Count of Status	Column Labels					
Row Labels	Acceptable	NCRAddressed	Non Conformance	N/A	Observation	Grand Total
-3--worker-dnr-regs-	5	1		4		10
Activity follows management plan	9			1		10
Activity Matches documentation	9			1		10
Activity meets fsc requirements	4			6		10
Activity on woodlot	4			8		12
Activity Reported	6			6		12
-Ansul-pack-				3		3
-Appropriate-training-	3					3
-Back-up-alarm-	6			1		7
-Blade-guard-				3		3
-Boundaries-as-per-plan-	17					17
-Brakes-	6			1		7
-Chain-catcher-				3		3
-Chainsaw-pants-				3		3
-Complaints-addressed-	1			14		15
-CSA-Boots-				3		3
-Culverts-ok-	11	1		2		14
-Escape-hatch-	6			1		7
-Eye-protection-				3		3
-Fall-protection-	6			1		7
-Felling-procedures-				3		3
-First-aid-kit-	6			4		10
-First-aid-training-	10					10
-FSC Representative-Informed-	18					18
Fuel Hose and tank Properly secured	7			4		11

Fuel hose ok	6		4	1	11
Fueling Station not near watercouse	7		4		11
-Fuel-oil-approved-containers-	2		3		5
-Garbage-removed-	18		1		19
-Hardhats-	7		4		11
HCVF Identified	4		8		12
HCVF Stratefy Followed			2		2
HCVF Strategy Effective	4		8		12
HCVF Strategy Followed	4		6		10
-HCVF-Strategy-effective-	2		17		19
-Hearing-protection-			3		3
-Housekeeping-	14		4		18
Landowner aware of FSC requirements	9			3	12
-Machine-guards-	6		1		7
Management Plan Available and up to date	13				13
Management plan signed	12				12
-Merch-wood-utilized-	12		1	2	15
-Natural-species-selected where possible	3				3
NCR Issued			12		12
-Neighbors-informed-	15				15
-No-oil-spills-	14				14
Operator Aware of FSC status	11				11
Other Followup Required	2		10		12
-Pressure-bandage-			3		3
-Previous-CARs-addressed-	3		13		16
-Protected-areas-not-disturbed-	10		9		19
Pump nozzle ok	7		4		11
-Raptor-Nests-not-disturbed-	1		16		17
Recommended Improvements	3		9		12
-Rec-trails-ok-	8		8		16
-Remote-location-plan-	6		4		10
-Residual-trees-not-damaged-	17				17
-Riparian-zones-meet minimum standards-	11		1	1	13
-Roads-ok-	11		2		13
-Rollover-requirements-	5		1		6
Rutting < 40cm avg over 40m	12	1			13
-Safe-piling-	6				6
-Safety-chain-			3		3
-Safety-harness-latch-			3		3
-Safe-working-distance-	5		4		9
-Safe-work-technique-	5		4		9
Satisfaction with program	11			1	12
-Shovels-	4		5		9
-Silv-guidelines-followed-	1			2	3

-Spark-arrestor-				3		3
-Species-at-risk-checked-	13			2		15
Spill kit	8			2		10
-Spill-Kit-	6					6
-Stand-prescriptions-followed-	18					18
-Steps-and-hand-holds-	6			1		7
TDG Sticker clear and legible	7			4		11
-Temp-stream-xings-ok-	3		1	10	1	15
-Throttle-lock-out-				3		3
-Water-quality-maintained-No siltation	13	1			1	15
WCB Status ok	14					14
WHMIS Sticker clear and legible	7			4		11
Wildlife Clumps meet minimum standards	13			1		14
-Working-alone-procedure-	4			6		10
Grand Total	**537**	**4**	**1**	**288**	**12**	**842**

Monitoring Trends Analysis

Of the 5 non-conformances, 3 were related to the same harvest, primarily a result of significant rainfalls in December; the landowner arranged agreed upon remediation in the summer of 2024 during dry conditions. One other NCR addressed was related to having no shovels on site during fire season. This was addressed the next day. The remaining open NCR is related to temporary log crossings not being pulled following harvest. This remediation is awaiting the end of Wood turtle nesting season considerations (Oct31). A variety of observations (12) indicate no real trends other than the internal member survey indicating landowners with older plans needing some reminding about the FSC requirements and two occasions with small piles left following harvest.

An internal audit was carried out of the program in 2024. Of the total membership, 17 woodlots were sampled. Minimal activity had occurred on the sampled FMUs, the woodlots being more or less idle over the past year. Most landowners contacted were satisfied with the program to date. In a few cases, landowners needed a reminder as the FSC program requirements. Some recommendations for future value centered around increased access to funding and identifying more small crews for doing smaller area jobs.

Row Labels	Count of Status
Acceptable	537
NCRAddressed	4
Non Conformance	1
N/A	288
Observation	12
Grand Total	**842**

Non-Conformance Summary

InspectionTy	Title	Status
FSCInternal	Landowner aware of FSC requirements	Observation
FSCInternal	Landowner aware of FSC requirements	Observation
FSCInternal	Landowner aware of FSC requirements	Observation
Silviculture	-Silv-guidelines-followed-	Observation
Harvest	-Temp-stream-xings-ok-	NonConformance
Harvest	Fuel hose ok	Observation
Harvest	-Water-quality-maintained-No siltation	Observation
Harvest	-Merch-wood-utilized-	Observation
Harvest	-Riparian-zones-meet minimum standards-	Observation
Silviculture	-Silv-guidelines-followed-	Observation
Harvest	-Water-quality-maintained-No siltation	NCRAddressed
Harvest	Rutting < 40cm avg over 40m	NCRAddressed
Harvest	-Culverts-ok-	NCRAddressed
Harvest	-3--worker-dnr-regs-	NCRAddressed
Harvest	-Merch-wood-utilized-	Observation

2024 NSAWC Group Manager Internal Auditing Summary. FSC standard for group entities in forest management groups FSC-STD-30-005 V2-0

NSAWC internal monitoring procedures includes assessing all standard principles and criteria over the life of the active 5-year certification scope (requirement 11.2). This is done alongside annual member sampling for the internal audit. The 2024 selection includes Criteria 1.1, 1.2, 6.4, 7.2, 7.3, 8.1. The "Internal Auditing Criteria Master Reference NSAWC" tracks the full list of criteria by year.

Principle	Criteria	I note1	Internal Procedures Monitoring Year	Program leve	NCR description	Corrective Action Required	Comment
PRINCIPLE 1	Criterion 1.1	Respect for national and local laws and administrative requirements	2024	n			New commitment agreement created as a result of FSC 2022 audit
PRINCIPLE 1	Criterion 1.2	Payment of legally prescribed fees, royalties, taxes and other charges	2024	n			New commitment agreement created as a result of FSC 2022 audit
PRINCIPLE 6:	Criterion 6.1	Environmental impacts evaluation	2024				
PRINCIPLE 6:	Criterion 6.4	Protection of representative samples of existing ecosystems	2024	n			This process was established in the mgmt planning as a result of 2022 FSC audit finding.
PRINCIPLE 7:	Criterion 7.2	Management plan revision	2024	n			
PRINCIPLE 7:	Criterion 7.3	Training and supervision of forest workers	2024	y	the language in the policies and procedures only reflects organizational worker field training; not all forest workers.	Update policies and procedures	2023 fsc audit finding also;
PRINCIPLE 8:	Criterion 8.1	Frequency, intensity and consistency of monitoring	2024	y	the language in the policies and procedures was out-dated; not reflecting actual current procedures	Update policies and procedures	

The following table summarizes the results.

Row Labels	Acceptable	Non-Conformance Addressed	Non-Conformance	Not Applicable	Observation	Grand Total
Activity follows management plan	3	1	0	13		17
Activity Matches documentation	3	1	0	13		17
Activity meets fsc requirements	3	1	0	13		17
Activity on woodlot	4			13		17
Activity Reported	8			10		17
HCVF Identified	7			10		17
HCVF Stratefy Followed				10		17
HCVF Strategy Effective	7			10		17
HCVF Strategy Followed	7			10		17
Landowner aware of FSC requirements	10	2	0	5		17
Management Plan Available and up to date	17					17
Management plan signed	17					17
NCR Issued		1	0	16		17
Other Followup Required	5	1	0	13		17
Recommended Improvements	7			10		17
Satisfaction with program	11			6		17
FSCInternal Total	109	7		152		

NSAWC FSC® Woodlots, October 2024