Westlock County Wildfire Mitigation Plan

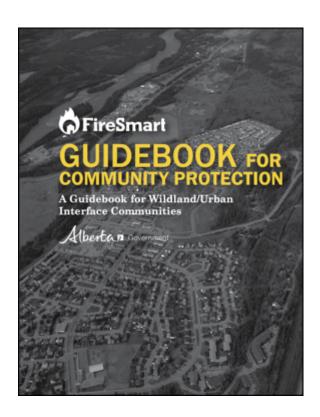
Larkspur July 27th 2019

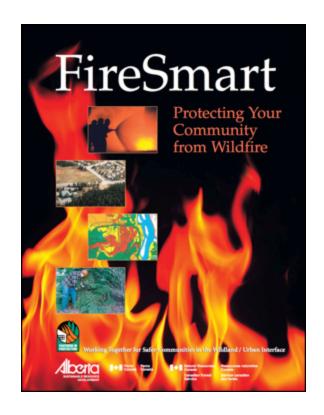




Outline

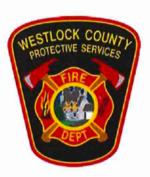
- 1. Wildfire risk assessments project.
- 2. Potential strategies for Larkspur.





Westlock County Wildfire Mitigation Plan





MHERMAN STEGEHUIS & ASSOCIATES LTD

Long Island Lake Wildland/Urban Interface Plan



Prepared for:

Westlock County



SV of Larkspur

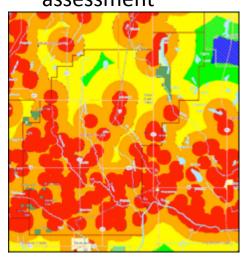


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July/2007

Wildfire Risk Assessment

Wildfire threat assessment



Aerial photography



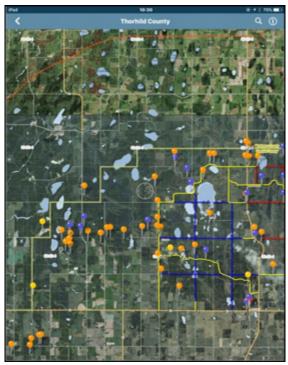
Aerial reconnaissance



Field assessments



Avenza app



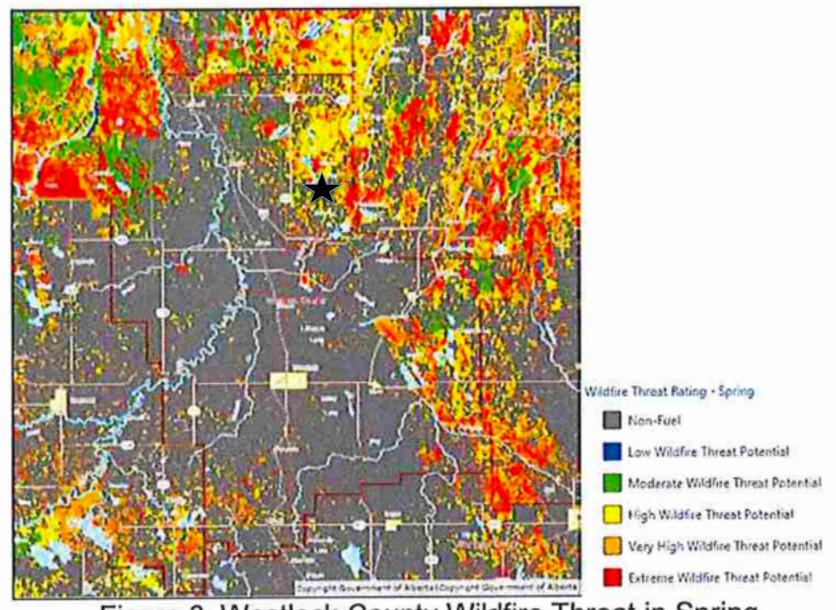


Figure 3. Westlock County Wildfire Threat in Spring













WESTLOCK COUNTY WILDFIRE RISK ASSESSMENTS

COMMUNITY WITHIN COUNTY	STRUCTURE & SITE RISK RATING	AREA RISK RATING (2km)	COMMENTS
Narrows (Long Island Lake East)	Extreme	Extreme	Very narrow access. Properties lacking defensible space. Subdivision is connected to fuel wick. Poor water access.
Spruce Hill Estates	Extreme	Extreme	Conifer fuel path leading up to and into subdivision. Natural Area to the North has overmature Jack Pine with Dwarf mistletoe disease. Conifer encroaching on access roads. No water source. Several homes without adequate defensible space.
Nestow	High	Extreme	Thick Jack Pine regen in areas previously burned-over. Most properties are well groomed and FireSmart. One home with wooden roof. Vacant block between 49th and 50th streets is thick pine regen hazard. Good access. No water source. Fuel path connected to Buckridge Campground.
Moon Acres	High	High	Smaller lots and limited road width. Properties are located between the lake and road, or between two roads. Defensible space is lacking, but most are well groomed. Best water access is at the campground boat launch.
Tawatinaw	High	High	Fine fuel hazard in valley. Some recent mowing. Good access and natural water sources. Includes Pine Valley Resort ski hill and separate lodging facilities. Significant conifer fuel wicks to the North and South with spotting potential.
			Rail line fine fuel hazard. Powerline on North end requires tree-freeing. Access to water by wooden CN rail bridge currently has limited access. Mostly well-groomed urban lots. Partly surrounded by tilled land. Wedge of Spruce adjacent to highway is part of larger fuel wick, commercial
Fawcett	High	High	potential on private land. Firehall. No hydrants.
Komar Nisky	High	Moderate	Lack of defensible space. Coniferous fuel wick along creek.
			Paved loop road, with some narrow private drives. Lacking water source. Several properties exposed to fine fuel hazards with minimal defensible
Regal Park	Moderate	Moderate	space. One hazardous Spruce stand in the center of the subdivision. Paved access, T-intersection turn-arounds. Some mixedwood. Smallerlots
Larkspur	Moderate	Moderate	but most are well groomed. Gated access to lake water.
SW corner Long Island Lake	Moderate	Moderate	Larger well goomed lots. Poor access to water. Narrow loop road for turn- around
Busby	Low	Moderate	Wide paved streets, no hydrants. Fire station. Surrounded by farmland. Some fine fuel hazards along tracks and vacant lots.
Pickardville	Moderate	Low	Roads to urban standards. Hydrants. Fire station. Some run down
Vimy	Low	Low	properties. Fine fuel hazards along tracks, perimeter, and vacant lots. Wide paved streets, no hydrants or other water sources. Surrounded by agriculture.
,		2011	Well goomed urban lots. Wide paved streets. Firehall. Surrounded by
Clyde	Low	Low	tilled land.
Willow Layne	Low	Low	Wide road with great turn-around. Well groomed country residential lots.
Brown Subdivision	Low	Low	Across from golf course. Lacking turn-arounds at ends of service road. Well groomed larger lots. Lacks water source.
Westlock	Low	Low	Urban standards with paved streets and fire hydrants. Some fine fuel hazards along East perimeter. Also fine fuel hazards along tracks and highway corridor.
Washiau Estatas	Levy	Levy	Very good access. Well manicured larger country residential lots.
Westview Estates Linaria	Low	Low	Surrounded by highway, agriculture and golf course. Lacking water source. Treat as a locality, not a community.
	2011	2011	Surrounded by tilled land. Well maintained. Rail fine fuel hazard, some
Pibroch	Low	Low	mowing. Wide mostly paved streets. No water source.
Dapp	Low	Low	Wide mowed stretch and road between tracks and homes. Paved wide streets. Water at creek.
Jarvie	Low	Low	Fine fuels along tracks could use HRB. Firehall. Paved wide access roads. Mostly well kept groomed lots.
Timber Woods	Low	Low	Nosary well kept groomed lots. Open higher end homes, well groomed. No watersource. Only driveways for turnaround.
Richfield Estates	Low	Low	Open high end, just being developed. Good gravel road with small turnaround. No watersource.
Westair Estates	Low	Low	Parrallel to runway, open area. Well groomed.
Crosswind Landing	Low	Low	Great road and turn-around Good water sources. Partly developed.

FireSmart ZONE 1/2/3 RISK RATING

Low= few properties have FS rating issues and would not likely be exposed to or expose neighbors to wildfire risk.

Moderate= several properties have FS rating issues such as lack of defensible space, and would likely be exposed to or expose neighbors to wildfire risk.

High= several properties have significant FS rating issues and would be difficult to protect. Properties exposed to higher hazard fuel types. Lack of defensible space.

Extreme = several properties have significant FS rating issues and would be difficult to protect. Increased risk to firefighters. Higher hazard fuel types extend into zone 3 and beyond.

2 KM RISK RATING

Low= minimal spotting potential from surrounding forests and minimal exposure to coniferous fuel wicks.

Moderate= some potential of ember transplant but coniferous fuel wicks, if any, do not pose a signficant risk.

High= potential of ember transplant and close proximity to coniferous fuels. Significant wildfire risk from fuel paths beyond community boundary.

Extreme= significant fuel path is directly connected to the communicy and extends well beyond the community boundary. In addition to ember transplant, crown fire may burn into the community.

Paved access, T-intersection turn-arounds. Some mixedwood. Smallerlots but most are well groomed. Gated access to lake water.

STRUCTURE & SITE RISK RATING

Low = few properties have FS rating issues and would less likely be exposed to or expose neighbors to wildfire risk

Moderate = several properties have FS rating issues such as lack of defensible space, and would likely be exposed to or expose neighbors to wildfire risk

High= several properties have significant FS rating issues and would be difficult to protect. Properties exposed to higher hazard fuel types.

Extreme = several properties have significant FS rating issues and would be difficult to protect. Increased risk to firefighters. Higher hazard fuel types extend into zone 3 and beyond.

AREA RISK RATING

Low= minimal spotting potential from surrounding forests and minimal exposure to coniferous fuel wicks

Moderate= some potential of ember transplant but minimal connection to a coniferous fuel wick

High= potential of ember transplant and close proximity to coniferous fuels

Extreme = directly connected with coniferous fuel wick and strong potential of ember transplant

Strategy	Priority	Action
# 2	high	include FireSmart education with
		existing community events

Background information: All communities with a high to extreme wildfire risk rating will be top priority for FireSmart community events. FireSmart education will be implemented at existing community events or delivered at community fire hall open houses. Interagency approaches will be used to enhance FireSmart information made available to the public. Government of Alberta FireSmart trailer and personnel may be available to assist. An interactive FireSmart display would be useful to engage younger age groups. Residents will be encouraged to sign up for a home hazard assessment at these events.

Strategy	Priority	Action
# 3	high	complete home hazard assessments with residents living in communities and on acreages and farmsteads with high to extreme wildfire threat

Background information: All communities with a high to extreme wildfire risk rating will be top priority for home hazard assessments. This will include the following communities: Fawcett, Long Island Lake (Narrows subdivision), Tawatinaw, Nestow, Spruce Hill Estates and Moon Acres. Fire Department staff will be trained to complete FireSmart home assessments through FireSmart Canada. As well, rural residences in areas of high to extreme wildfire threat will be targeted for FireSmart home hazard assessments. Homeowners will be contacted to share wildfire risk information and arrange appointments to complete the FireSmart

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assessments. This more assertive approach will be used to communicate with and educate residents regarding wildfire risk and their mitigation options.

4.6.2 Long Island Lake (Narrows)

Strategy	Priority	Action
# 27	high	implement commercial vegetation
		management on crown land



Figure 25. Coniferous Fuel Wick East of Long Island Lake (Narrows)



Figure 26. Recommended Vegetation Management Treatment Units

Strategy	Priority	Action
# 6	moderate	promote FireSmart Canada
		Community Recognition Program

Background information: Grant funding through FireSmart Canada is available to communities wanting to implement their own FireSmart program. FireSmart Canada Community Recognition Program & access to funding will be promoted.

4.6.9 Summer Village of Larkspur

Strategy	Priority	Action
# 34	moderate	complete a detailed FireSmart wildfire mitigation strategy specific to the Summer Village of Larkspur

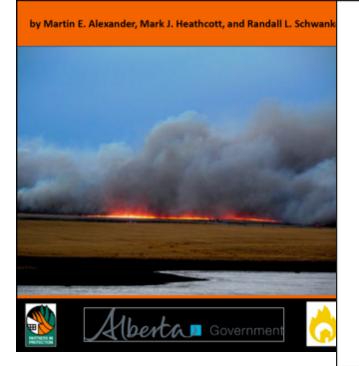
Background information: Some hazardous mixed wood forest exists on the east side of Larkspur. Individual lots are relatively small creating additional wildfire spread potential from lot to lot. FireSmart Canada community recognition program is highly recommended. A detailed review of FireSmart issues will enable priority setting and strategies specific to this municipality.

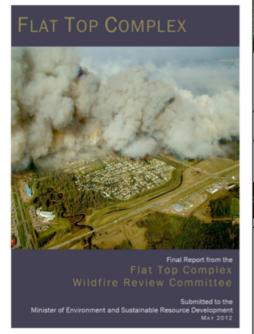
Types of strategies to consider...

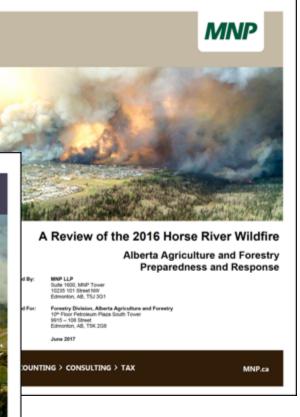
Education Vegetation Management Legislation and Planning Development Considerations Interagency Cooperation Cross-training Emergency Planning	-	What is FireSmart? >
Legislation and Planning Development Considerations Interagency Cooperation Cross-training		Education
Development Considerations Interagency Cooperation Cross-training		Vegetation Management
Interagency Cooperation Cross-training		Legislation and Planning
Cross-training		Development Considerations
		Interagency Cooperation
Emergency Planning		Cross-training
0 , 0		Emergency Planning

Strategies Related to Lessons Learned

Fire Behaviour Case Study of Two Early Winter Grass Fires in Southern Alberta, 27 November 2011







Ideas & Options

- Use the 2007 FireSmart Plan as background information to complete a detailed community assessment and updated FireSmart Plan.
- Obtain grant funding through FireSmart Canada to start your own community recognition program.
- Include a FireSmart component to community events.
- Address home to home combustion by encouraging FireSmart home hazard assessments.