

WILD TURKEY MANAGEMENT PLAN FOR THE CITY OF MOORHEAD ADOPTED / /2020

TABLE OF CONTENTS

City of Moorhead Wild Turkey Management Concerns

- 1.0 City of Moorhead Wild Turkey Management Plan Summary
- 1.1 Wild Turkey Habitat Use and Population Estimate
- 1.2 Visitation and Recreation Areas
- 1.3 Concentrated Habitat Use and Human Safety Issues
- 1.4 Proximity Sensitive Areas

Wild Turkey Management Recommendations

- 2.1 Goals and Measures
- 2.2 Geographic Scope
- 2.3 Management Techniques
- 2.3.1 Population Reduction
- 2.3.2 Tracking Management Activities for Future Adjustments
- 2.3.3 Habitat Modification
- 2.3.4 Temporary Physical Barriers
- 2.3.5 Permanent Physical Barriers
- 2.3.6 Redistribution Techniques
- 2.3.7 Excrement Removal in Roost Areas
- 2.4 Public Information
- 2.5 Partner Relationships and Permit Requirements
- 2.6 Communication Plan
- 2.7 Staff Contact

Appendices:

- Appendix A City of Moorhead Context and Land Cover Map
- Appendix B City of Moorhead Impervious Land Cover Map
- Appendix C City of Moorhead Turkey Survey Map
- Appendix D Buffalo Red River Watershed Hunting Map
- Appendix E Moorhead Management Activity Tracking Form
- Appendix F Proposed Wildlife Feeding Restricting City Ordinance

City of Moorhead Wild Turkey Management Concerns

1.0 Wild Turkey Management Plan Summary

The Moorhead Wild Turkey Management Plan is a comprehensive action and educational guide for Moorhead resident reference and not an annual scheduled removal program. This plan is a resource for reducing property damage or public health and safety concerns. Some turkeys, usually the yearling males (Jakes), may become aggressive and chase homeowners, children and pets. Through community involvement, this plan will provide for population control and habitat initiatives to best address the nuisance complaints. Removal plans will only be implemented as needed for nuisance turkeys when deterrent methods are ineffective. This plan is designed to utilize non-lethal removal strategies first and whenever possible. The plan includes collaboration with the Minnesota Department of Natural Resources (DNR) and is supportive of future translocation opportunities that would have to be approved through the MN DNR. Wild turkey hunting is permitted during season in specifically designed areas within the Buffalo Red River Watershed District. Other lethal disposition techniques will be considered and implemented in association with wild turkey population numbers that exceed the general public tolerance upon approval by the Minnesota DNR. The plan also provides for city staff to guide and implement wild turkey removal when approved.

1.1 Wild Turkey Habitat Use and Population Estimate

The city of Moorhead is located in the heart of the Red River Valley, 200 miles northwest of Minneapolis. The city covers approximately 22.2 square miles with a population of 43,522 as estimated by the Minnesota State Demographer.

The city of Moorhead encompasses approximately 14,268 acres of varied habitats. When Moorhead was initially settled in 1871, the majority of the landscape was cultivated farmland and open fields, with remnant wetland, wet prairies, and floodplain forest. Today, Moorhead is a fully developed urban city with approximately 24% of the area being buildings and hard surfaces. Areas of habitat include 64.7% partially vegetated land cover, forests and woodlands comprise 5.9%, open grasslands, shrub lands, and prairies 1.4%. Open water and wetland habitat is about 3.3%. (See Appendix A)

Overall, developed land and cultural (non-native) vegetation encompass about 89.4% of Moorhead's land cover of which about 61.8% of this is native-dominated plant communities. This value has been

relatively constant over the past few decades. Moorhead continues to look long-term to increase the quantity and quality of natural areas within the community. (See Appendix B)

Wild turkeys use the Red River and various areas within the city. Nesting occurs in a variety of habitats including wooded and marsh areas, thick shrubbery, downed trees, in natural tall vegetation bordering open green spaces and in wildflower garden areas. Newly hatched broods tend to feed within the city boundary areas and in communities that border Moorhead. After their flightless period of a few days, wild turkeys are more mobile and frequently use private and public property for dusting, roosting and feeding.

The city of Moorhead has not formally surveyed wild turkey population in the past. A trial survey using aerial drones, and simultaneous vehicle ground counts, was conducted on February 11, 2020, to generate a population index to turkeys residing within the city limits. We acknowledge that we were unable to observe every bird during our survey, but our results indicate that the minimum number of turkeys residing in Moorhead during our survey was at least 158. Therefore, we will continue to utilize our standardized survey methodology to generate future population indices that can be compared across future years. The Red River and areas east throughout Moorhead were surveyed by the drone. Due to air space restrictions, the Oakport area was surveyed by vehicle. Three larger flocks containing 45, 48, and 65 wild turkeys were located. (See Appendix C)

This documented sample population record will serve as a benchmark for future comparisons to better gauge the overall trending population numbers in the same geographical areas during the same time of year. There is no desire to pre-determine an acceptable total population number, but would rather use this data in evaluating the success of strategies used. We will use the population index numbers to enhance our ability to determine the number of birds to help insure minimal property damage and public safety issues from turkeys.

1.2 Visitation and Recreation Areas

Flocks of wild turkeys can be found along the Red River, in our parks, nature areas, picnic areas, playgrounds, roads, parking lots, hiking trails, wooded areas, ball fields, and other public and private property.

1.3 Concentrated Habitat Use and Human Safety Issues

Areas in which wild turkeys are causing damage or health and human safety issues include parks, picnic areas, roads, parking lots, lawns, golf course greens & tee boxes, private residential property and business property throughout Moorhead. "Nuisance" turkeys tend to be aggressive with people and may impact daycare centers, religious facilities, schools, delivery services, including daily mail delivery, traffic or recreational facility use.

1.3.1 Proximity Sensitive Areas

Because our wild turkey removal plan is based on managing specific problem areas only and not an annual removal program, all property at any potential location will have sensitivity issues. Generally, a drop net process or baited traps will be utilized unless specific circumstances exist to support the use of a firearm. Depending on the types of baited traps used, this process may attract non-target wildlife and domestic pets. Contracted services for wild turkey removal will employ strategies and systems that minimize the impact to all other domestic and wild animals.

2. Wild Turkey Management Recommendations

2.1 Goals and Measures

The city of Moorhead wildlife management plan is designed for problem area response due to wild turkey issues when identified by residents and city staff. This is not a citywide annual removal process plan. The two primary areas of concern are public safety and property damage.

Staff has identified three goals for implementing a wild turkey management program.

- The primary goal is to support community public and private property owners' efforts to reduce/remove wild turkeys on property not owned by the city of Moorhead. This would also extend to all future property owned by the city of Moorhead that has not yet been identified as a wild turkey population problem response area.
- 2) The second goal is to develop and implement a communication process that informs both residential and corporate property owners about strategies to deter feeding and loafing wild turkeys. Information will include insights regarding the issues of feeding wildlife and options to make property areas unattractive for turkeys by developing natural barriers that deter turkeys from loafing on and around property.
- 3) The final goal is to implement turkey removal when on-going public safety and damage is identified.

2.2 Geographic Scope

The removal goals are focused on an as needed basis throughout the city of Moorhead. Wild turkey management techniques are not planned for any specific locations at this time or as a scheduled annual removal process. If in the future the wild turkey populations grow to a point a planned and scheduled removal program is required, staff will work with the City Council and the Minnesota Department of Natural resources to develop and implement a process for the city of Moorhead.

2.3 Management Techniques

The management techniques for wild turkey management for the city of Moorhead will be varied in type and geographic area. Meeting the goals as outlined may require the implementation of a broad set of options. Any one management technique used alone will likely be ineffective for any significant length of time, since tolerance and habituation will likely occur. As a result, we propose the use of an adaptive management approach, where a number of techniques, applied in varying ways, times and locations will provide the best outcomes.

2.3.1 Population Reduction

Animal Management

The plan recommended is not an annual population reduction management process. When a nuisance turkey(s) is identified and action required, staff will request a Removal Permit from the DNR for the wild turkey(s). Permit request will outline all issues, location(s) and conditions that will be followed as well as the reporting of any removal(s).

Egg Oiling

The plan supports the practice of egg oiling to reduce the number of hatching eggs in a nest. It involves coating the egg shells with corn oil. This stops air from passing through the shell to the embroyo and prevents it from developing properly. This has proven to be an affordable and extremely effective non-lethal and humane birth control method. The parent turkey will normally re-lay another clutch of eggs immediately if other egg interferences are attempted such as breaking, removing, shaking, cracking, or pricking eggs. Two or Three eggs must be left unoiled to avoid the parent turkey abandoning the nest to re-lay in another location. Minnesota DNR wild turkey permits are required in advance. Moorhead Police Community Service Officers will perform this practice when nests are reported or discovered.

Turkey nests containing eggs should be reported to the Moorhead Police Department through the city website homepage of <u>www.cityofmoorhead.com</u> "How Do I" section for reporting wild turkey nuisance or nests.



Trapping and Removal (Winter Period)

Capture and removal of mixed age groups of wild turkeys during the winter period is an effective way to reduce the localized population. In addition to utilizing city staff, the use of contractors for the capture, removal and disposition of wild turkeys from the city of Moorhead is a management option. Such removal would need to be detailed as part of a removal permit application through the Minnesota DNR. Wild turkey removal and disposition will be conducted according to the permit conditions.

Specific action plans can't be predetermined due to availability of options at the time; however, this plan supports future considerations when applicable toward controlled harvest and donation to homeless shelters, residents, or a local zoo.

Wild Turkey Hunting Season

Minnesota has wild turkey hunting seasons. The Buffalo Red River Watershed District allows bow hunting on most of their property within city limits. Interested parties must inquire with them and obtain written permission. See Appendix D for maps of the designated areas. City of Moorhead staff does not coordinate or facilitate wild turkey hunting.

Lethal Wild Turkey Removal

The city of Moorhead does not plan to use on-site lethal removal of wild turkeys unless a specific removal need is dictated by the Moorhead Police Community Service Officer and other non-lethal options aren't reasonable based on the situation. Selective and occasional lethal removal of individual or small groups of wild turkeys may be needed if other redistribution or hazing methods do not work. Lethal removal of wild turkeys by means of a firearm or capture with net guns on an occasional basis is a management option. Such removal would need to be dictated by the Moorhead Police Department. This type of removal would be included as part of a removal permit application through the DNR Fish & Wildlife Division, and wild turkey removal and disposition would need to be conducted according to the specific permit conditions. Such conditions would include the number of individual wild turkeys and the specific information about the methods to be used for the removal and disposition.

2.3.2 Tracking Management Activities for Future Adjustments

All management activities will be documented on the Management Activity Tracking Form in Appendix E. The Moorhead Police Department will keep a copy of all management activity forms on file to help facilitate future management activities that might need adjustments or improvements.

2.3.3 Habitat Modification

There are some direct habitat modifications that may be beneficial for long-term management of wild turkeys. Covering dusting sites with rock may deter them and encourage them to move to another area that has less public use. In some cases pruning of certain branches on roost trees may prove beneficial. In addition, the opportunity of being able to halt access, remove food sources, or altering other attractants can also be beneficial.

2.3.4 Temporary Physical Barriers

The use of temporary fencing, rocks and other natural barriers (botanical gardens - pollinator gardens) that limits wild turkey access to the high use pedestrian traffic areas during the various Minnesota seasons will be considered. Any fencing that may be installed would be established in a manner or distance that prevents wild turkeys from entering the fenced off area from the adjacent roost areas.

2.3.5 Permanent Physical Barriers

Completely excluding wild turkeys from a specific area is difficult based on their ability to fly. The use of permanent woven wire fencing or more residential aesthetically pleasing fence such as composite, wood or privacy lattice, or other options may be considered if it limits wild turkey access to high pedestrian traffic use areas. Staff understands this may help to deter but not completely prevent access. These fences can be blended into the area with tall flowering forbs, grasses or shrubs. Any fencing that is installed would need to be approved by the City of Moorhead Planning & Zoning and will be established

in a manner that prevents wild turkeys from entering the fenced off area from adjoining areas. Routine inspection of the fence will be done by city staff when installed on publically owned property.

2.3.6 Redistribution Techniques

Preventing large flocks of wild turkeys from roosting, feeding or dusting throughout Moorhead and adjacent areas will be an ongoing process. We anticipate using a number of techniques, when needed, to remove wild turkeys creating public safety issues and property damage. Additionally, we plan to use multiple techniques at varied times and with subtle shifts in methods so that the wild turkeys do not become habituated to any one technique or become accustomed to a particular schedule of activity. Staff will also investigate any residential feeding which may be keeping wild turkeys in a specific area. A city ordinance restricting the feeding of wildlife in the city is supported and part of this plan. (See Appendix F) Staffs' goal is to have very limited impact on residents and patrons, mitigating any disruption will be a priority. Some redistribution techniques require specific training, personal protective equipment and adherence to policies and procedures for their safe use. A thorough examination of all removal/relocation options will be reviewed prior to employing a particular technique. Depending on the method(s) utilized, if it is determined public notification is needed, city staff will implement a communication plan.

> Human and mechanical disruption options that may be considered;

- Disturbing roosting and feeding wild turkeys by individuals on foot so wild turkeys can be moved out of the public safety/nuisance area to a location that is more supportive of wild turkey habitat.
- Sprinklers or water devices.
- o Drones over trails or open areas.
- Remote control cars/trucks.
- Be persistent and use a combination of techniques for best results. If problem persists, consider removal options.

Dogs or other trained animals

- Specially trained dogs that are capable of providing non-lethal hazing.
- Use of trained dogs and handlers to move turkeys away from high used public areas.
- Resident pets will not be allowed for this purpose.

Pyrotechnic options

- Limited use of pyrotechnic options such as flares, bangers, crackers, popper shells, etc. can be temporarily effective in moving wild turkeys and dissuading them from returning to a given area. Special training, handling and storage considerations would need to be considered. Use restrictions and notification requirements would be required prior to the use of pyrotechnics. Safety will always be the number one priority when considering pyrotechnics for the relocation of wild turkeys.
- Flash bangs from Orion Safety Products have been used on a sporadic basis with success to dissuade wild turkeys from using a particular area.

> Options for repellants for roosting

- Bird spikes in common roost areas.
- Spray on products that create unwelcome residues have been successful to slow down roosting. An example is Bird-X "4 The Birds Repellant" – product leaves a sticky residue on surfaces including tree branches, rooftops, asphalt, etc.
- Remote and automated lighting systems.

Predator decoys

 The use of 2D or 3D coyote/dog decoys sometimes discourages area use by wild turkeys. The periodic use of decoys continues to be a management option. Decoys that are placed intermittently and exhibit periodic motion due to wind gusts can be effective, however must be moved on a very regular schedule to be affective.

Feeding ban on wild turkeys

- No feeding ordinance for wild turkeys within city limits.
- Enforcement of no feeding ordinance.

2.3.7 Deterrents in Roost Areas and Excrement Removal

At this point in time, the city of Moorhead does not remove wild turkey excrement. City staff understands the primary goal to effectively redistribute wild turkeys away from high use pedestrian areas helps to reduce wild turkey feces. Large concentrations of wild turkeys on softball fields, golf course sand bunkers and in park play areas with sand play spaces where excrement is deposited is vulnerable to Ecoli. Staff would only remove wild turkey excrement from sand/aggregate athletic facilities and youth play areas with sand if the problem is extensive and persistent.

2.4 Public Information

Informing the public about wild turkey management activities is an integral part of a successful wild turkey management plan. Signage or posted notices may be developed for certain activities. Additionally, city staff and all contractors performing removal services will provide a copy of the removal permit to all residents and patrons upon request. All persons performing management activities should provide users with accurate and thorough information about wild turkey management objective, and inform users how the particular management activity being conducted fits into the larger wild turkey management plan.

The city of Moorhead will promote resident reporting options of turkey complaints/safety concerns to appropriate Moorhead Police staff via e-mail or phone. The city will also provide wild turkey resource information and nuisance reporting electronically through the city website <u>www.cityofmoorhead.com</u>

2.5 Partner Relationships and Permit Requirements

Coordination of wildlife removal activities will be a collaboration between the Moorhead Police Department and Minnesota DNR. City staff will be responsible for requesting permits and providing detailed conditions for removal, along with notification to the locally assigned MN DNR Conservation Officer. All permits must be retained while conducting all associated activities.

2.6 Communication Plan

Community Stakeholder Public Wild Turkey Input Session held at City Hall – January 8, 2020

Review of initial draft of Wild Turkey Management Plan (WTMP) sent to Minnesota DNR staff for comment and adjustments – February 2020.

The initial draft of the WTMP made available for hard copy review to City Manager and Executive Leadership Team. – February 2020

Electronic draft of proposed plan placed on city website for review and input beginning in April 2020.

Proposed city ordinance restricting the feeding of wildlife presented to council along with the WTMP May 2020.

2.7 Staff Contact

Any questions regarding the Wild Turkey Management Plan can be directed to: Tory Jacobson, Deputy Police Chief, Moorhead Police Department at 218.299.5117 or tory.jacobson@moorheadpolice.com.

APPENDIX

- Appendix A City of Moorhead Context and Land Cover Map
- Appendix B City of Moorhead Impervious Land Cover Map
- Appendix C City of Moorhead Turkey Flocks Map
- Appendix D Buffalo Red River Watershed Hunting Map
- Appendix E Moorhead Management Activity Tracking From
- Appendix F Proposed Wildlife Feeding Restricting City Ordinance

DEPARTMENT OF NATURAL RESOURCES

Wildlife Damage Program Wild Turkey Management Plan Approved April 21, 2020.

Wildlife Damage Program Supervisor, Eric Nelson

Area Wildlife Manager, Mike Oehler

Appendix A – City of Moorhead Context and Land Cover Map











Appendix D – Buffalo Red River Watershed Hunting Map

LiProjects/2008/506.073 OTP Phase 4 Flood Mitigation City Rd 11Drawing 506.073/OAKPORT ROW Map - JRY 4-23-19.dwg OVERALL 4/26/2019 8:41

Appendix E - Moorhead Management Activity Tracking Form

DATE	Time	Name	Activity/Method	Location	Notes

Appendix F – Proposed Wildlife Feeding Restricting City Ordinance

ORDINANCE NO. 2019-

AN ORDINANCE TO AMEND AND REENACT SECTION 3-7-1 AND 3-7-9 OF THE MOORHEAD CITY CODE RELATING TO ANIMAL CONTROL DEFINITIONS AND PROHIBITED ACTS AND CONDITIONS.

BE IT ORDAINED by the City Council of the City of Moorhead as follows:

SECTION 1. Section 3-7-1 of the Moorhead City Code is hereby amended and reenacted

to read as follows:

Terms used in this chapter have the following meanings:

AT LARGE: Off the premises of the owner or caretaker, and not under the control of the owner or caretaker by leash which a person has physical control over.

FEED: Making food available for consumption outdoors, either on the ground or at a height of less than five feet (5'). For purposes of this chapter, a person does not feed wildlife by maintaining live vegetation, such as fruit trees, gardens, or flower beds.

OWNER: Any person or persons, firm, association or corporation owning, keeping or harboring a dog or a cat.

PROPER ENCLOSURES: Shall have sidewalls with a minimum height of five feet (5') and be constructed of 11-gauge or heavier wire. Openings in the wire shall not exceed two inches (2"). Support posts shall be one and one-fourth inch (11/4") or larger steel pipe buried in the ground eighteen inches (18") or more. When a concrete floor is not provided, the sidewalls shall be buried a minimum of eighteen inches (18") in the ground. (Ord. 2005-1, 2-22-2005; amd. Ord. 2005-27, 10-17-2005; Ord. 2008-23, 11-24-2008)

WILDLIFE: Undomesticated animals living in the wild. This definition includes feral cats and dogs.

SECTION 2. Section 3-7-9 of the Moorhead City Code is hereby amended and reenacted

to read as follows:

- A. Premises Kept Clean: Any person operating or maintaining a kennel for any number of dogs or cats, either commercially or privately, or maintaining a dog or cat on a leash, or chained in a back yard or elsewhere, or allowed to roam in a fenced in yard of any size, shall clean waste material daily. All waste material shall be stored in steel containers, covered fly and watertight and to prevent any noxious odor therefrom.
- B. Animal Wastes On Public And Private Property: No person shall allow a dog or cat owned by them or in their possession to deposit animal waste in city parks, on public property or on the property of other citizens or residents of the city. Any person charged and convicted of a violation of this subsection shall be subject to a fine or administrative penalty not to exceed

ten dollars (\$10.00) for the first offense and thereafter not to exceed fifty dollars (\$50.00) for further offenses.

- C. Animals Disturbing The Peace¹: No person shall keep or harbor any animal, which habitually barks, cries or howls. Any such animals, which habitually bark, cry or howl are hereby declared to be a public nuisance. "Habitually barking, crying or howling" shall be defined as barking, howling or crying for repeated intervals of at least five (5) minutes, with less than one minute of interruption. Such barking, crying or howling must be audible off of the owner's or keeper's premises. Any person desiring to make an administrative or criminal complaint against the owner or keeper of a habitually barking, crying or howling animal must contact the police department and state facts supporting the alleged nuisance. The police department, upon receipt of a sufficient complaint, shall then notify the person owning, harboring or keeping the animal that a complaint has been received and that such nuisance must be abated, and remain abated for a period of two (2) months. Notice shall be sufficient for purposes of this section if the alleged violator is informed orally of the complaint or if notice of the complaint is posted upon a door of the residence where the alleged violation occurred. If the animal is not quieted within the above time period and for the above described time period, an administrative or criminal complaint may be made out against the alleged violator.
- D. Feeding Of Deer-Wildlife Prohibited: No person shall feed or allow the feeding of any deerwildlife within the city limits, unless that person is doing so in the course of that person's employment as a veterinarian, city employee, or Minnesota Department of Natural Resources employee. For purposes of this section, "feeding" shall mean the provision of one-half (⁴/₂) eubic foot or more of grain, fruit, vegetables, nuts, hay or other edible material, either on the ground or at a height of less than five feet (5') above the ground, in a manner that attracts deer on a regular basis. Living food sources, such as fruit trees and other live vegetation, shall not be considered as deer feeding. This prohibition shall not apply to veterinarians, eity animal control officers and park maintenance staff, or county, state or federal game officials who in the course of their duties have deer in their custody or under their management. (Ord. 2005-1, 2-22-2005)

SECTION 3. This ordinance shall take effect upon publication in accordance with the

Moorhead City Charter.

PASSED by the City Council of the City of Moorhead this ____ day of _____,

2019.