

**12. Permit surface disturbance associated with natural gas exploration, production and development on 956 acres (13%), conditionally permit 1,839 acres (25%) and 4,611 acres (62%).**

Sections 23-1101 and 9-0507 of the Environmental Conservation Law authorizes the Department of Environmental Conservation to make leases on behalf of the State for exploration, production and development of oil and gas on State lands. Proposals to lease parcels of Department of Environmental Conservation regulated State lands for this purpose will be considered following public notice in the Environmental Notice Bulletin (ENB), and in local newspapers. A public meeting will be held to provide information about natural gas development specific to the Unit and receive comments. A 30-day public comment period will follow. The Department will consider all comments prior to making a decision. If the Department decides to pursue leasing, the site specific conditions for limiting impacts on natural resources encompassed in this plan will be drafted by land managers and incorporated into contract documents. These conditions will include but not be limited to criteria for site selection, mitigation of impacts and land reclamation upon completion of drilling. A number of factors are considered when determining where surface disturbance will be allowed or disallowed. The presence of regulated wetlands, riparian areas, steep slopes, significant recreation areas, presence of rare, threatened or endangered species or unique ecological communities, are all areas which may be excluded from surface disturbance. Certain land management strategies, such as natural areas, where timber harvesting is precluded, which may be incompatible with oil and gas well development, may result in exclusion from surface disturbance. This determination is made as a part of the tract assessment process on a case by case basis. Individual tract proposal reviews for each forest within this Unit have been completed and determinations regarding areas excluded from surface disturbance have been made. Included in Appendix XXIII are maps depicting these areas. Any parcel designated as a non-surface entry lease will no longer be subject to the review process detailed above due to the prohibition of surface disturbance(s).

The Federal government conveyed 100% of the surface lands of the Tioughnioga Wildlife Management Area and a minority interest (25%) of the mineral estate to the State of New York, reserving 75% of the mineral estate to the United States. Should leasing of the Tioughnioga WMA take place in the future, the State would receive 25% of all bonus bids and royalties. Recent discoveries within the Trenton Black River play have renewed interest in exploring for natural gas throughout central and western New York.

Well siting will be compatible with surface management plans. While dependent upon underlying geological conditions, well siting will occur using a hierarchy of surface disturbances consistent with management objectives. Locations will be considered in the following order, progressing from areas of greatest disturbance to the least: shale pits, grassland, shrubland, and even aged stands. When siting wells, the surface

manager will consider the hierarchy in order to minimize disturbance especially to uneven-aged stands. Within uneven-aged stands, well locations will be explored within 250 feet of existing roads before exploring beyond 250 feet.

#### Well Siting Hierarchy

Shale pits  
Grassland  
Shrubland  
Even-aged stands  
Uneven-aged stands within 250 feet of existing roads  
Uneven-aged stands over 250 feet of existing roads

The following conditions apply:

Each natural gas well requires approximately 1-2 acres of open land to accommodate the roads, equipment and infrastructure necessary for well site development (GEIS, 1988). Even-aged stands and grass and shrubland communities require periodic clearcutting, mowing or burning to perpetuate a preferred structure and species composition. The open conditions required for well site development are consistent with management objectives in these vegetative cover types. Restoration in these stands will be consistent with the surrounding vegetative cover type. These activities will be permitted where surface disturbances are consistent with land management objectives.

Surface disturbances associated with site development in stands designated for uneven-aged management is contingent on restoration of closed canopy conditions. Uneven-aged stands provide habitat for interior wildlife species and distribution of these stands across the landscape is intended to maximize habitat connectivity and the benefits associated with unfragmented forest cover. Canopy gaps resulting from site development disrupt habitat connectivity and diminish the quality of interior forest conditions. Within six months of completion of drilling in uneven-aged stands, or as dictated by season or planting conditions, a disturbed site will be reforested such that the area occupied by the gas well will not exceed 1/4 acre. The 1/4 acre limitation is consistent with uneven-aged management strategy for this Unit and will hasten restoration of closed canopy conditions. Soil profiles and the composition and distribution of native plant species will be restored consistent with surrounding vegetative cover. A restoration plan will be addressed with a Temporary Revocable Permit. Access roads will be established and maintained to conditions resembling surfaced skid trails. The maximum width of the access road surface will be 12 feet. Construction of the road will insure and maintain canopy closure over the majority of the road. Geotextile fabric may be used in lieu of removing soil. Access roads will be closed to the public, and reclaimed to a surface condition capable of supporting vegetation. Access by the lessee will be authorized by lease and Temporary Revocable Permit.

The remaining 4,611 acres on the Unit will be excluded from site development due to

conflicts with other land management objectives. Surface disturbance associated with natural gas production, timber harvesting, road construction and other types of development will be excluded from designated natural areas, recreation zones, protection areas and all wetland, riparian and other aquatic habitats. Management objectives in these areas are directed at protecting natural resources for the ecological and recreational benefits associated with undeveloped land. Well pad and log landings will be set back 250' from wetlands, stream corridors and ponds unless otherwise authorized by the Department. Proposed and existing recreational trails will be buffered 500' when officially designated as Department recognized trails. Surface disturbance associated with well site development is not permitted on slopes greater than 15%. Department approval is required for surface disturbances associated with oil/gas well access road and logging road construction within the 250' setback areas.

For the life of the Plan, gas development on the Unit will not exceed a maximum of 12 sites within the Unit, unless the Department approves a drilling pad development plan submitted by the lessee that identifies a denser development spacing. Any number of wells over 12 will require a change to the Plan, and may precipitate the UMP amendment process, including additional public meetings. Any number of well bores may be attempted from these sites. This spacing standard allows for the drainage of gas reserves without significant impact to surface conditions. The maximum surface disturbance at any well site will not exceed two acres unless otherwise approved by the Department upon justification of the lessee. The transportation of gas using distribution and collection lines (pipelines) and utility lines will be located adjacent to Public Forest Access Roads or the existing disturbed areas created to construct the well sites. Additional surface disturbance associated with such construction will be considered in areas other than uneven-aged stands. The lessee must comply with all policies and provisions of the ECL Rules and Regulations, and all work associated with prospecting, drilling and laying of pipes must be approved by the Department in writing. A bonded Temporary Revocable Permit and Drilling Permit will be required before well pad development. The Unit is not being considered for gas storage. However, if a proposal for gas storage is submitted to the Department, it may be considered as a separate lease. It will require a change to the Plan, and may precipitate the UMP amendment process, including additional public meetings. Any proposal for gas storage development must be consistent with the objectives of this Plan. Once wells are played out, they will be plugged and abandoned.

To ensure the compatibility with the natural resources objectives within the Plan, the land managers will review and evaluate all proposals for surface disturbance associated with oil and gas leasing. This will determine the suitability of these activities and will include a review of the well siting and drilling pad development plans, well site disturbance and the location of distribution, collection and utility lines.

At the time of leasing, a public information meeting will be scheduled. The purpose of the meeting will be to provide information about natural gas development specific to the

Unit including the distribution of well sites, the duration of drilling activities and any necessary site restoration.

### **13. Protect 425 acres of visual, historic, recreation and inaccessible sites.**

One hundred fifty-seven acres scattered throughout the unit have terrain challenges where timber harvesting, road construction and other types of planned disturbances will not be permitted. These sites have slope conditions greater than 40% or are isolated by drainages or wetlands creating difficult access for forest management. The main focus of leaving these areas out of active management will be to prevent unnecessary impact to soil and water resources.

An additional 57 acres of selected view sheds and other scenic resources will be managed to preserve those conditions that enhance the aesthetic quality of the landscape.

The remaining 211 acres associated with this objective are designated recreation sites. With the exception of the temporary disturbances necessary to enhance public access, these recreational sites will be managed to provide relief from built environments and to create conditions associated with undeveloped areas.

### **14. Maintain 7 acres of shale pits.**

There are two shale pits within the Unit that provide surface material necessary for roads, trails, parking areas, boat launches and camp sites. Shale extracted from these pits will be utilized exclusively for State land construction projects and will not be made available for commercial use. If annual extractions are determined to be greater than 1,000 tons or 750 cubic yards of material, then a mined land reclamation and recovery plan will be required. Regional mined land staff will be consulted at that time.

### **15. Protect the natural resources from fire, insects, disease and trespass.**

A program of protection from wildfire will be maintained to assure minimum risk or loss to humans, structures and forest resources. This program is the responsibility of the Ranger force within the Division of Forest Protection and Fire Management.

The protection of forest resources from injurious insects and tree diseases will be accomplished through an established program of integrated pest management (I.P.M.). This program incorporates a system of reconnaissance, analysis, determination of thresholds and controls when necessary, with an emphasis towards natural method of control to help safeguard against any large scale outbreaks.

The integrity of the State land boundary lines is also very important for resource protection. Seventy-five point nine miles of boundary lines will be maintained on a

seven year cycle on the WMA.

On State forests, 39.18 miles of boundary lines will be scheduled on a seven year cycle. Boundary lines will be repainted and signed at this time. Additional surveying when necessary will also maintain the integrity of the property lines.

#### **16. Support natural resource research and data collection.**

There are opportunities to permit the use of the Tioughnioga Unit for ongoing research in the natural resources field with nearby colleges such as Morrisville State College, Colgate University in Hamilton and the College of Environmental Science and Forestry at Syracuse. The Department will encourage cooperation with colleges and other groups to assist in research and provide an outdoor laboratory setting for such study as long as those efforts enhance or are compatible with this Plan's goals and objectives. Natural resource research influences and updates management decisions and strategies.

In addition to supporting academic research, the Department will conduct periodic data collection through forest inventory.

Responsible protection and successful integration of natural resource use will be the overriding influence used to guide the management actions of this Plan.

Electro-fishing surveys of protected and unprotected streams within the Unit should be carried out to update our knowledge of fishery resource. Surveying unprotected streams will determine whether they support trout. Protected status can be attained for unprotected streams now supporting trout.

#### **17. Acquire 636 acres of private land within the Unit.**

The purchase of private in-holdings is intended to improve landscape level management and enhance public use and recreation opportunities. The current fragmented ownership pattern within sections of the Unit will be consolidated through fee title acquisition from willing sellers. In addition to a reduction in administrative costs, acquisition of private parcels will improve public access and reduce the potential for private property conflicts.

### **II. Public Use and Recreation Goal**

In general, State lands often offer opportunities for recreational activities that are best enjoyed in remote, relatively undisturbed natural areas. Such activities typically require only a minimum of facility development or site disturbance. Activities meeting these criteria are compatible with maintaining and protecting the natural character and features of State land. Visitors to the Unit's lands do not pay admission fees, and

limited facility development and associated construction and maintenance costs are consistent with this principle.

By law and policy, State Wildlife Management Areas are managed to provide wildlife habitat, opportunities for wildlife research and wildlife related recreation. Other compatible uses are permitted.

There are three components to the public use and recreation section of this plan:

- Maintaining and enhancing public access
- Maintaining and enhancing recreational opportunities and facilities
- Providing educational opportunities

The above guidelines and principles will be used to determine the extent of development and type of facilities.

Numerous other factors influence the placement or expansion of facilities on this Unit. These influences include maintaining ecological integrity, the ability to fulfill primary purposes for which the land was acquired, public safety issues, accessibility, aesthetics, fiscal constraints and recreational opportunities beyond the boundaries of the Unit.

Designation of long distance recreational trails that pass from State to private land will only be granted with agreement and written permission from private landowners.

All new and existing recreational trails will have information posted at principle trail heads to guide public use.

The Americans with Disabilities Act (ADA), along with the Architectural Barriers Act of 1968 (ABA) and the Rehabilitation Act of 1973; Title V, Section 504, have had a profound effect on the manner by which people with disabilities are afforded equality in their recreational pursuits. The ADA is a comprehensive law prohibiting discrimination against people with disabilities in employment practices, use of public transportation, use of telecommunication facilities and the use of public accommodations. Title II of the ADA applies to the Department and requires, in part, that reasonable modifications must be made to its services and programs, so that when those services and programs are viewed in their entirety, they are readily accessible to and usable by people with disabilities. This must be done unless such modification would result in a fundamental alteration in the nature of the service, program or activity or an undue financial or administrative burden to the Department. Since recreation is an acknowledged program of the Department, and there are services and activities associated with that program, the Department has the mandated obligation to comply with the ADA, Title II and ADA Accessibility Guidelines, as well as Section 504 of the Rehabilitation Act.

### **The Americans with Disabilities Act (ADA) and Its Influence on Management Actions for Recreation and Related Facilities**

The ADA also requires that a public entity assess the level of accessibility provided to people with disabilities for each of the programs and services it offers to the public. An assessment entails the use of a formal process that examines the facility (such as a trail, lean-to or picnic area) in terms of the standards established by ADAAG (either adopted or proposed) and/or the New York State uniform Fire Prevention and Building Codes, as appropriate. An assessment process and a schedule for completing the assessment have been developed for this planning Unit. This activity is dependent on obtaining an inventory of all the recreational elements comprising the programs available on the Unit.

### **The Americans with Disabilities Act Accessibility Guidelines**

The Americans with Disabilities Act (ADA) requires guidelines, i.e., standards, to ensure that buildings, facilities, programs and vehicles covered by the ADA are accessible, in terms of architecture and design, transportation and communication, to individuals with disabilities. A federal agency known as the Access Board has developed such guidelines and has issued the Americans with Disabilities Act Accessibility Guidelines ("ADAAG") for this purpose. Current ADAAG addresses the built environment: buildings, ramps, sidewalks, rooms with buildings, etc. The Access Board has proposed guidelines to expand ADAAG to cover outdoor developed facilities: trails, camp grounds, picnic areas and beaches. The proposed ADAAG is contained in the September, 1999 Final Report of the Regulatory Negotiation Committee for Outdoor Developed Areas ("Report"). Until such time as the proposed ADAAG becomes an adopted rule of the Department of Justice, the Department is required to use the best information available to comply with the ADA and ADAAG, which includes the Report.

### **ADAAG Application**

ADAAG applies to newly constructed structures and facilities and alterations to existing structures and facilities. Further, it applies to fixed structures or facilities, i.e., those that are attached to the earth or another structure that is attached to the earth. Therefore, when the Department is planning the construction of new recreational facilities or elements in support of recreational facilities, or is considering an alteration of existing recreational facilities or elements supporting them, it must also consider providing access to the facilities or elements for people with disabilities, using the adopted ADAAG for buildings, the proposed ADAAG for outdoor developed areas, the New York State Uniform Fire Prevention and Buildings Codes and other appropriate information to accomplish that task. The standards which exist in ADAAG or are contained in the proposed ADAAG also provide guidance to achieve modifications to trails, picnic areas, camp grounds (or sites) and beaches in order to obtain programmatic compliance with the ADA.

The following types of facilities or elements pertaining to those facilities are examples to which adopted and proposed ADAAG would apply: parking areas, pedestrian trails,

outdoor access routes, sanitary facilities, trail registers, informational bulletin boards, kiosks, interpretive trail narratives, equestrian support elements including platforms and stalls, camp grounds / campsites including tent pads, sinks, restrooms or privies, water supply spigots, hydrants and drinking fountains, cooking surfaces including pedestal grills and fire rings with grills, picnic tables, trash containers, fire rings, lean-tos and warming huts.

## **A. Public Use and Recreation Objectives**

### **1. Install and maintain five informational kiosks.**

Kiosks will supply the public with site specific information on each State land property. Information will include a State land map that identifies important features and recreational facilities; rules and regulations; and a registration box.

Kiosks will be installed at the following locations:

- (a) the intersection of Stanton Road and the forest access road on DeRuyter State Forest.
- (b) the intersection of Fire Tower and Mack Roads and the forest access road on Morrow Mountain State Forest.
- (c) Stoney Pond Campground.
- (d) rehabilitate the kiosk on Damon Road (TWMA).
- (e) at the bus turn-around on Dugway Road (TWMA).

### **2. Improve facilities at Stoney Pond Campground.**

Ensuring public safety, natural resource protection and a quality camping experience will require an alteration of existing campground facilities. The following are site specific improvements:

- (a) due to poor sanitary facilities, periodic flooding and access difficulties, island camping (see Appendix XVI) will be closed beginning in 2005.
- (b) combine sites 3 and 4 and combine 11 and 12 to accommodate groups up to 10 persons.
- (c) eliminate peninsula site (#13) to improve day use and fishing access. Lack of a vegetative buffer at this site tends to elevate noise levels throughout campground.

(d) construct six additional camp sites along west side of Stoney Pond. Four sites will have parking pads and two sites will be accessed only by foot or boat.

(e) drill well and provide pitcher pump for potable water - test water quality annually.

(f) rent two portable sanitary units to improve campground sanitation and provide access for people with disabilities.

(g) install picnic tables and campfire grates at each site and picnic tables within day-use area.

(h) using Section 190.8, prohibit overnight camping with horses, with posting.

(i) improve public safety by eliminating hazardous trees and branches in and around campsites. Conduct annual survey of campground facilities to identify and remove hazardous conditions.

(j) pursue the transfer of jurisdiction of Stoney Pond Road from State forest boundary east to dam site through official abandonment. Maintenance responsibilities will transfer from the Town of Nelson to the Department.

### **3. Redesign Stoney Pond boat launch peninsula site to accommodate multiple recreational uses.**

Stoney Pond is an important natural resource that provides opportunities for a variety of water-based recreation. Unrestricted vehicle use and poor accessibility, however, have created user conflicts and have prevented optimal site utilization. Improvements are intended to enhance public safety and accessibility and to broaden recreational opportunities. The following are site specific improvements to the boat launch peninsula:

(a) restrict vehicle use on the peninsula to temporary loading and unloading activities and designate parking along campground road.

(b) restrict vehicle access using boulders from sections of the peninsula and reclaim site to promote natural vegetation.

(c) construct accessible fishing platform.

(d) designate the boat launch site.

(e) install signage to guide public use on the peninsula.

(f) upgrade surface conditions to enhance accessibility, accommodate temporary

vehicular use and improve drainage.

**4. Designate, upgrade and maintain existing cross-country ski trails east of Jones Road for mountain bike trail use on Stoney Pond State Forest.**

Increased mountain bike use on the forest within the last decade necessitates improved facilities to mitigate environmental impacts and prevent trail conflicts. The following trail improvements are proposed:

- (a) upgrade surface conditions where trail passes through sensitive areas.
- (b) permit seasonal mountain bike use between May 1 and October 31.

**5. Design a signage system to provide directions on to State lands and to guide use within the properties.**

The remote location of State land and the absence of adequate signage hinders access to the properties from major travel corridors. In addition, limited signage at recreational facilities and along trails results in uncertainty about appropriate use. To improve access and public use, highway signs will be installed at the following locations:

- (a) at the intersection of State Rt. 13 and Hunt Road and the intersection of Hunt and Stanton Roads to direct users to the DeRuyter State Forest.
- (b) at the intersection of State Rt. 80 and Fire Tower Road and at the intersection of Erieville Road (Co. Rt. 67) and Fire Tower Road to direct users to the Morrow Mountain State Forest.
- (c) at the intersection of Jones Road and Tuscarora Road (Co Rt. 86) and at the intersection of Jones Road and Old State Road to direct users to the Stoney Pond State Forest.
- (d) at the intersection of Damon Road (Co Rt 52) and Erieville Road (Co Rt 67) to direct users to the Tioughnioga Wildlife Management Area.

**6. State Forest identification signs will be installed at the following locations:**

- (a) at the intersection of Stanton Road and the forest access road on the DeRuyter State Forest
- (b) at the intersection of Fire Tower and Mack Road and the forest access road on the Morrow Mountain State Forest
- (c) Jones Road on the Stoney Pond State Forest

## **7. Designate, construct and maintain 7.6 miles of horse trails.**

There is significant interest in developing a long distance horse trail system within southern Madison County. The Cazenovia Area Equine Association (CAEA) has proposed a 25 mile "equestrian loop trail" that would utilize both public and private lands in Cazenovia, DeRuyter, Georgetown and Nelson. In support of this concept, the Department has designated corridors for trail development within the Unit. The precise location of trails, particularly where they access State land, may vary depending on the outcome of negotiations with adjacent private landowners. Trail easements and other agreements with private landowners will be the responsibility of CAEA. Final trail location and design on State land will be determined by the Department.

Designated horse trails within the Unit will be routed to minimize potential environmental impacts and conflict with other State land users. The trails are intended to be a part of a larger trail system that will enhance recreational opportunities for equestrians throughout the region. In addition to trail corridors, parking areas and watering facilities will be designated and constructed at various locations within the Unit. On State forests, trail riding will be limited to designated corridors and will not be permitted off-trail. By law, horses are not permitted on the Link Trail or North Country Trail on State forest lands. On the Tioughnioga WMA, signs will be posted at hiking trailheads that state: *No Horses or Mules Permitted on Hiking Trails on This Area (unless owner is legally licensed for hunting or trapping and is in the pursuit of legal game)*. All horse related activities will be for day use only; overnight camping with horses will not be permitted. Equestrians will be encouraged to construct and maintain trails and other facilities through participation in DEC's Adopt-a-Natural Resource program.

Horse trails and support facilities will be designated and/or constructed at the following locations: (See also Appendix XXIV, Public Use maps).

On DeRuyter State Forest, Fairbanks and Stanton Roads and the public forest access road will be designated as a carriage driving and horse riding trail. A parking area to service this trail will be constructed on private land off Webber Road by CAEA. A riding trail will be designated on Kinney Hill, the eastern boundary of DeRuyter State Forest.

On Stoney Pond State Forest, a trail will connect Hughes Road with Jones Road and Jones Road with Green Road. Beginning at the gated access road adjacent to Hughes Road the route will follow ski trails 6 & 7 to trail 3 across the Stoney Pond dam, following trail 14 south of the campground to Stoney Pond Road and eventually out to Jones Road. By law, horses are not permitted on snow covered designated snowmobile and ski trails on State land or within the Stoney Pond Campground. Between Jones and Green Road the route will follow Captain Jenks Road through Madison County Forest and Stoney Pond State Forest. At the intersection of Captain Jenks and Green Roads the route will proceed south through a gated access point and off the forest. A parking area at the intersection of Jones and Jenks Roads on Madison County Forest

will service this trail and provide parking for horse trailers. One watering site will be established along the Jenks Road segment of the trail.

On the TWMA, a pass through trail corridor will be provided primarily on sections of maintained roads on or near the western boundary of the area, except for a 0.5 mile segment on an existing lane used for farm machine access and a section which veers onto adjacent private land.

Construction of horse trails leaving or entering the State lands will be contingent on acquiring permission from private property owners.

Establish a seasonal use of the trails between May 1 and October 31.

#### **8. Designate, construct and maintain 7.5 miles of hiking trails.**

Long distance hiking trails are important recreational resources that provide opportunities to access natural and cultural landscapes throughout the region. Because of their unfragmented ownership pattern, State lands play a critical role in advancing long distance trail development. Within the Unit, new trails will improve access, reduce conflict with other State land users and enhance the overall hiking experience.

The north-south Madison County Link Trail is a project to connect the Old Erie Canal Towpath in Canastota with the Finger Lakes Trail in Chenango County. Much of the Link Trail has been constructed on both private and public lands by volunteers with the Central New York Chapter of the North Country Trail Association. The east-west Onondaga Trail is a proposal to connect the Link Trail with the Finger Lakes Trail in Cortland County. Segments of the trail have been constructed by the Onondaga Chapter of the Adirondack Mountain Club (ADK) which represents a large segment of the regional hiking community. Together, the Onondaga and Link Trails are part of the of the larger North Country Scenic Trail Association (NCTA) that provides New Yorkers with the opportunity to access an interstate trail system. Both the Central NY Chapter of the NCTA and ADK are active participants in the Adopt-A-Natural Resource program, and the Department will continue to work with these groups to enhance long-distance hiking trails.

Segments of the Link and Onondaga Trails will be designated and/or constructed. (See Appendix XXIV for proposed and existing public access)

On the TWMA the Link Trail will enter from the north at Irish Hill Road and proceed off-road and southwest to Holmes Road. The trail will follow the abandoned Holmes Road south to its intersection with Damon Road. Crossing Damon Road, the trail will continue due south to the AT&T utility right-of-way and east to Madison County Forest. From its northeast corner, the trail will follow the east boundary of County Forest to Dugway Road. Crossing Dugway Road, the trail will continue off-road and southwest to leave the TWMA at its southwest boundary near the terminus of Jones Road. Continued trail

development south of Dugway Road is contingent on permission to cross private property and access Jones Road. Trail head parking areas are located on both Damon and Dugway Roads and no additional facilities to service the Link Trail are proposed.

While the Link Trail will be almost entirely single use, it will remain on or immediately adjacent to its present route. State-owned portions of the Holmes Road section of this route will be rehabilitated to address severe erosion problems and thus reduce siltation to Limestone Creek. Where rehabilitation cannot be accomplished to a degree suitable to foot traffic, the trail will be adjusted slightly out of the old corridor but will remain very close to its present location.

On DeRuyter State Forest and the TWMA, the Onondaga Trail will be constructed to establish an east-west connection between the Link Trail and the Finger Lakes Trail in Cortland County. From its junction with the Link Trail on Holmes Road, the Onondaga Trail will proceed southwest and follow the property line as a single use trail separated from the short stretch of horse trail which is aligned along the nearby farm machine access lane. The Onondaga Trail will leave the TWMA just north of Limestone Creek. South of Damon Road the trail will utilize Corkinsville Road and onto private land.

On DeRuyter State Forest, the trail will enter on the eastern boundary, proceed west to an existing parking area on Fairbanks Road and continue west crossing a tributary of the Middle Branch of the Tioughnioga Creek to a second parking area on the Forest Access Road. From here the trail will continue west across Stanton Road onto a "flag parcel" and eventually onto private land. Trail designation on DeRuyter State Forest and south of Corkinsville Road on the TWMA is contingent on permission to access private properties that are adjacent to State land.

**9. Designate and maintain 6.2 miles of snowmobile trails. (See Appendix XXIV for map)**

Snowmobiling is a popular form of winter recreation that is experiencing growing participation within the region. The Moonlight Riders and Snow Valley Riders are two local snowmobile clubs that maintain trails on Stoney Pond, DeRuyter and Morrow Mountain State Forests. The following routes will be designated snowmobile trails and clubs will be encouraged to maintain these trails through participation in the Adopt-A-Natural Resource program.

(a) The entire length (0.7) of Green Road as it passes through Stoney Pond State Forest and a 0.5 mile section between Green Road and the west boundary of the State forest.

(b) The entire length (1.0 mile) of Fairbanks Road as it passes through DeRuyter State Forest.

(c) The entire length (1.0) of Parker Hill Road, the Forest Access Road (0.9 mile) and a

0.4 mile off-road section between Parker Hill Road and the Forest Access Road on Morrow Mountain State Forest.

(d) Permission to use the entire length of the 1.7 mile utility ROW on the TWMA will, at the discretion of DEC, be granted with a Temporary Revocable Permit issued to the Snow Valley Riders on an annual basis. Area speed limits for snowmobiles will be posted, and, in the event of significant problems or inability to enforce such limits, the trail will be closed.

**10. Designate, construct and maintain 7 new parking areas. (See Appendix XXIV, map of existing and new parking areas)**

In addition to existing parking areas which will be designated and signed, public access on the Unit will be improved by constructing new parking areas for 3-5 vehicles at the following locations:

On Stoney Pond State Forest at the intersection of Hughes Road and the gated Department access road, adjacent to Stoney Pond boat launch and at the intersection of Stoney Pond Road and Trail # 2 to service new camp sites.

On Morrow Mountain State Forest, a parking area for people with disabilities will be constructed on an existing log deck west of Fire Tower Road.

On the TWMA, at the intersection of Dugway and Mayerle Roads, at the intersection of Damon Road and the AT&T access road and on the east side of Corkinsville Road south of the AT&T access road.

**11. Promote public awareness about resource management and the Unit's natural and cultural history.**

Sustaining the Unit's natural resources is contingent on a public informed about land use history, ecology, forest management and the environmental impacts of resource consumption. Brochures, interpretive signs, habitat demonstration areas, guided walks and other educational programs will be used to raise public awareness about natural resources and State land management.

**12. Restrict vehicle access from designated areas by installing and maintaining gates or boulders. (See Appendix XXIV for map)**

Gates will prevent unauthorized vehicles from impacting the Unit's vegetation, wildlife habitats, wetlands and sensitive sites while maintaining access for management activities. One new gate will be installed on Morrow Mountain State Forest on Mack Road south of the entry to the SUNY Morrisville property. Four existing gates located on the TWMA (Tinsley Hill, Corkinsville, Mayerle and Peterson Hollow Road) will be

replaced and three gates on Stoney Pond State Forest (Hughes, Green and Stoney Pond Roads) will be maintained. Gates on Tinsley Hill and Peterson Hollow will be opened between May 1 and December 15. The Green Road gate will be open between December 15 and April 15.

Boulders will be installed at the Corkinsville and AT&T line intersection and the intersection of Holmes and Damon Rd.

### **13. Maintain 3.5 miles of Forest Access Roads (See Appendix VI, Roads on the Unit)**

To ensure both public safety and efficiency in conducting forest management activities, these roads require annual roadside mowing, culvert clearing and bi-annual surface grading. In addition to periodic maintenance, major rehabilitation is required on the following roads:

On the TWMA, 0.50 miles of Holmes Road south from Irish Hill Road, 0.3 miles at the southern end of Peterson Hollow Road and 0.3 miles at the west end of Tinsley Hill Road will be maintained. Surface materials necessary for road rehabilitation are available from a shale pit on TWMA.

On DeRuyter State Forest the 0.9 mile Tromp Road will be maintained and on Morrow Mountain State Forest the 1.5 mile Mollie Road will be maintained.

### **14. Designate and maintain a 1.4 miles access trail for people with disabilities using motorized vehicles.**

To ensure that people with disabilities have the opportunity to enjoy the benefits of State lands, an access trail for those with mobility impairments has been designated. Qualified individuals may obtain a Temporary Revocable Permit (TRP) to use all terrain vehicles (ATVs) or other off highway vehicles on the designated trail. The trail is located west of Fire Tower Road on Morrow Mountain State Forest and provides access through both plantation and northern hardwood cover types. The trail is serviced by a parking area that is accessible for those with disabilities.

ATV use on the motorized access route for people with disabilities (CP-3) trail is restricted to people with disabilities and is not open for recreational riding. People with mobility impairments can obtain a Temporary Revocable Permit to use ATVs on designated CP-3 trails. The Morrow Mountain CP-3 trail is 1.4 miles in length and is located north of Firetower Road. It will be serviced by an off-road parking area with a capacity of three vehicles.

Public use of ATVs on the Unit outside of the designated CP-3 trail and 0.2 mile ATV trail is not permitted. Currently by law, ATV use is excluded on all Wildlife Management

Areas. ATV use on State Reforestation Areas is only permitted on marked trails such as those designated as CP-3 trails.

The pre-existing recreational uses within the Unit, primarily the Stoney Pond Nordic Ski Trail System, would pose unavoidable conflicts with any permitted ATV use.

Also, the small character of the State forests, poor soil drainage and moderate topography are not favorable to support recreational ATV trails.

### **15. Maintain water impoundments.**

There are 10 constructed water bodies on the Unit. Seven of these water impoundments are found on the TWMA, two on Stoney Pond State Forest and one small impoundment on Morrow Mountain State Forest. The largest of these is the 44 acre Stoney Pond off Jones Road on Stoney Pond State Forest.

These water impoundments were created to enhance wildlife habitat and recreational use on State lands. All impoundments have an earthen dike with a water level control device or drop box to regulate the water level.

These water resources are an important asset to State lands, and it is the goal of the Department to maintain them through routine inspection and needed upgrades in the following manner:

- (1) mow all earthen dike areas on a biennial basis
- (2) maintain overflow devices by inspecting on a yearly basis
- (3) reshape and rework the back of the dike in Stand E-65 on the Tioughnioga Wildlife Management Area. Add material to the front face of the dike to repair eroded areas.
- (4) install a new water level control device in Stoney Pond that would be resistant to damage and blockage by beavers.

### **16. Maintain 0.8 miles of haul roads for Department use within the Unit.**

Haul roads are developed and maintained by the Department primarily for access for forest product sales. These roads are traditionally not open for public use and are physically blocked or gated and only for use by authorized personnel.

There are two roads that meet this status on the Unit.

One is Holmes Road on the TWMA, and the other is a 1/4 mile access road that proceeds south off of Hughes Road on Stoney Pond State Forest.

Holmes Road is a qualified abandoned road that is now impassible due to lack of maintenance over the years. The northern section of this road (3,600 ft +/-) will be

upgraded to allow access for forest product removal. After harvesting, vehicular access will be blocked where State ownership occurs on both sides of the road.

The access road on Stoney Pond State Forest is currently gated and has been improved recently as part of a timber sale trade-off for forest product removal. This roadway will remain closed to vehicle traffic to the public. Periodic maintenance will be performed as needed either through Department efforts or further trade-offs with future forest product sales.

#### **17. Reconstruct the lean-to on Madison #9.**

This old lean-to has fallen into disrepair. The existing wood structure will be dismantled and replaced with a rustic lean-to of similar dimensions.

#### **18. Name the Public Forest Access Roads.**

The new name for the Public Forest Access Road on Madison #9 is Tromp Road. Tromp was one of the four townships originally named by the Holland Land Company in 1802 that included part of DeRuyter. The name is derived from Admiral Von Tromp, an officer in the Dutch Navy. The new name for the Forest Access Road on Madison #10 is Mollie Road. The road is named for Mrs. Mollie Frawley who owned land on Morrow Mountain and sold it to the State Conservation Department in 1937.

### **III. Cooperative Management Goal**

Achieving landscape level management objectives is contingent on developing partnerships that transcend ownership boundaries. State lands are much too disjointed and represent too small a land area to solely have a significant impact on landscape ecology. Conservation of biodiversity, watershed protection, open space, viewsheds and the success of long distance recreational trails are dependent on cooperation between the people who share a common landscape. Establishing partnerships with multiple landowners provides an opportunity for capturing mutual benefits not possible through individual efforts.

#### **A. Cooperative Management Objectives**

##### **1. Establish a cooperative land management program with SUNY Morrisville and Madison County.**

While forging partnerships with private landowners is critical, cooperation between public agencies represents a working model necessary for achieving landscape management objectives. Morrisville State College and Madison County currently manage 612 acres of forest land (see Appendix XXI) adjacent to three properties within the Unit. Both agencies have participated in the Tioughnioga planning process and

have expressed support for a cooperative management program. Specific management strategies include:

- (a) extend riparian protection on streams that cross boundaries
- (b) improve access across boundaries to prevent impacts to water resources and to reduce the number of trails and landings necessary for timber harvesting operations
- (c) consistency in stand level management to develop conditions necessary for achieving common silvicultural and wildlife habitat objectives
- (d) expand trail networks and facilities for enhanced recreational opportunities
- (e) expand educational opportunities for Morrisville students through participation in State land management activities

## **2. Conduct public programs to promote cooperative land management.**

Engaging citizens, conservation organizations, public agencies, schools and other groups in a dialogue about landscape ecology provides the forum necessary for advancing an understanding of cooperative management. Public programs could include guided walks, workshops or collaborative projects between public and private landowners.

## **3. Encourage participation in the Department's Adopt-A-Natural Resource and Cooperative Forest Management programs.**

The Adopt-A-Natural Resource (AANR) program or similar agreement is designed to encourage volunteer participation in State land management projects. This program has strengthened the role of citizens in planning and implementation of recreational and habitat improvement projects. Implementation of specific management objectives defined for the Tioughnioga Unit will include establishing partnerships with organized groups or individuals through the AANR program.

The Cooperative Forest Management (CFM) program is designed to advise private landowners on sustainable forestry practices. Implementation of practices such as stream protection, trail design and reforestation provide benefits beyond the boundaries of an individual property. Furthermore, consistency in management practices across property boundaries, such as retaining snags or establishing stream buffers will create landscape conditions not possible through individual effort.

## MANAGEMENT ACTION SCHEDULES

### A. Table of Land Management Actions

The tables present a 20 year schedule of planned management actions referenced by stand number and year of management. Maps showing the specific stand locations are available for viewing at the Sherburne Office. These schedules were created for the draft plan. Most actions scheduled for the years 2003-2006 have been completed.

Abbreviations or codes for the table are listed below:

<u>CODE</u>	<u>MANAGEMENT DIRECTION</u>	<u>DEFINITION</u>
<b>EVEN</b>		
E	Normal Rotation	100-120 year rotation for natural stands; variable rotation age for plantations
EL	Long Rotation	120+ year rotation
ES	Short Rotation	40-60 year rotations of pioneer hardwoods
PL	Plantation	Planted trees-conifer or hardwood
<b>UNEVEN</b>		
U	Normal interval	20 year cutting interval
UE	Experimental	50 year cutting interval
<b>PROTECTION AREAS</b>		
ZA	Inaccessible	
ZF	Recreation areas	
ZH	Historical	
ZR	Riparian	
ZS	Steep	
ZV	Visual Aesthetics	
ZW	Wetland	
<b>MISCELLANEOUS</b>		
AP	Apple	Apple trees
BR	Brush	Shrub species other than apple
GR	Grass	Non-woody species-burnable/mowable
PD	Pond	Made by man or beaver
PT	Pit	Shale, gravel, sand etc.

<u>CODE</u>	<u>PRESENT VEGETATIVE COVER TYPES</u>
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BL	Black Locust
BR	Shrub Land
DF	Douglas Fir
EL	European Larch
GR	Grass
JL	Japanese Larch
JP	Jack Pine
JP-NS	Jack Pine - Norway Spruce
L-NS	Larch-Norway Spruce
NH	Northern Hardwoods
NH-Hem	Northern Hardwoods-Hemlock
NH-WP	Northern Hardwoods-White Pine
NS	Norway Spruce
NS-N	Norway Spruce - Native Tree Species
OF	Open Field
PD	Pond
PH	Pioneer Hardwood
PT	Pit
RO	Red Oak
RO-RP	Red Oak-Red Pine
RO-WP	Red Oak-White Pine
RP	Red Pine
RP-L	Red Pine-Larch
RP-NS	Red Pine-Norway Spruce
RP-WP	Red Pine-White Pine
RP-WS	Red Pine-White Spruce
SP	Scotch Pine
SP-NS	Scotch Pine-Norway Spruce
WA	Wetland-Alder
WC	White Cedar
WO	Wetland-Open
WP	White Pine
WP-NS	White Pine-Norway Spruce
WS	White Spruce

<u>CODE</u>	<u>OBJECTIVE TYPES</u>	<u>DEFINITION</u>
AP	Apple	Area managed primarily for apple trees
BR	Brush	Shrub species other than apple
GR	Grass	Non-woody species-burnable/mowable
HS	Hardwood/Softwood	10-30% of tree cover is conifer
HW	Hardwood	Hardwoods are the dominant tree cover
PD	Pond	Made by man or beaver
PH	Pioneer Hardwood	Aspen is the dominant tree species
PL	Plantation	Planted trees - conifer
PT	Pit	Shale, gravel, sand etc.
SH	Softwood/Hardwood	30%+ of tree cover is conifer
SN	Spruce-Natural	Naturally regenerated Norway or white spruce often including varying amount of hardwoods
WH	White Pine/Hardwood	A plantation or natural white pine stand managed to develop and eventually become a hardwood stand while retaining the white pine component to its maturity
WO	Wetland-open	Includes brush or other non-tree vegetation

<u>CODE</u>	<u>MANAGEMENT ACTION</u>	<u>DEFINITION</u>
BN	Burn	Burn grass or shrub land
DO	Bulldoze	Bulldoze shrubs to create grass openings
FW	Firewood Thinning	A firewood only harvest
GC	GC	Overstory removal to favor ruffed grouse habitat.
IN	Integrated Treatment	A harvest of mostly low-grade timber with some sawtimber in a natural stand
PC	Plantation Clearcut	Removal of plantation overstory with no release of understory regeneration
PT	Plant Trees	The establishment of a plantation
PU	Spruce Thinning	Spruce harvest-pulp or sawtimber. The treatment might also include firewood
RA	Release Apple	Non-commercial treatment to release apple
RC	Pine Conversion	Pine/larch harvest with conversion of stand to a hardwood type

<u>CODE</u>	<u>MANAGEMENT ACTION</u>	<u>DEFINITION</u>
RE	Remove trees	Complete removal of overstory trees to favor grass or brush types
RT	Pine Thinning	Pine/larch stand that is thinned
ST	Sawtimber Harvest	A harvest of mostly sawtimber trees in a natural stand
TR	Pine Thin/Conversion	A combination treatment where a portion of a pine/larch/fir stand is thinned and another portion is converted to release hardwood reproduction
TS	Timber Stand Improvement	A non-commercial thinning in a plantation or natural stand.