

LOWER SAUCON TOWNSHIP MAINTENANCE POLICY FOR TOWNSHIP PARKS

This policy is intended to cover the maintenance of all Township owned parks and is to be the default policy in parks or areas of parks where no specific maintenance plan has been separately prepared, and supplemental in parks or areas of parks where maintenance plans have been prepared. These parks include the following:

Town Hall Park

- 1 baseball/soccer/football field
- 1 soccer/lacrosse field
- 2 playgrounds
- 1 pavilion
- 1 walking trail
- 1 nature trail

Polk Valley Park

- 3 soccer/football/lacrosse fields
- 2 baseball fields
- 2 warning tracks
- 4 dugouts
- natural areas
- paved trails
- grass trails
- 1 playground
- 1 pavilion

Southeastern Park

- 1 baseball field
- 1 playground
- 1 pavilion
- 1 meadow

Steel City Park

- 1 baseball field
- 1 pavilion
- 2 playgrounds

Heller Homestead Park

Park and nature trail w/overlook

Kingston Park

Park and Ella's Garden (meadow)

Easton Road Fields

- 1 baseball field

Dog Park

Reading Drive Trailhead

A. Aeration

- Township athletic fields shall be core aerated at least once each year, in late summer (early Sept) just prior to overseeding and fertilization.
- Overseeding
 - Shall be at a rate of 6 to 8 lbs seed/1000 ft²
 - Use a blend of 2 to 4 perennial ryegrass seed varieties. (i.e. Synatek – Triple Play Ryegrass blend or Fisher & Son – Signature Rye blend or Tournament II Rye blend)
 - All seed should be less than 1 year old.
 - High use areas in fields may need additional aeration, seeding, and fertilization to keep an adequate turf.
 - Overseeding areas that have >95% turf cover is not necessary.
- Core aerating a day or two after a soaking rain will yield the best results.
- Core aeration should not occur when turf is in stress, i.e., drought conditions.
- Spike aerators should not be used.
- Each aeration should involve a minimum of two (2) passes over the playing field. The aeration should consist of close center hollow core cultivation on the closest spacing possible 2" to 4" apart at a minimum depth of 2" to 3".
- Once the fields have been core aerated and the plugs are beginning to dry, the fields should be dragged repeatedly to break up the cores.
- Just after cores are broken-up, seed and granular fertilizer can be broadcast.

B. Agronomist Services

The Township Parks & Recreation Board recommends that the Township employ the services of a certified agronomist to inspect the playing fields and other township recreational areas as needed, analyze the soil on a semi-annual basis in the spring and late fall (before and after the playing season) and make recommendations to the Township regarding the ongoing maintenance of the turf surfaces.

C. Fertilization & Weed Control Schedule

Fertilization of Township parks & athletic fields will be done by an outside contractor in accordance with the following schedule:

- When fertilizers are used, they should be organic or "slow-release" sources.
- Fertilization is not necessary in natural areas, only on athletic fields.
- To assess soil P, K and pH levels, soil tests should be taken from each field every 2 years.
- Total N per year should be 2-5 lbs N/1000 ft² with heavy use fields getting the higher rate.
- Fertilization should be performed only by individuals who are qualified to do such work.
- Fertilization should be implemented in the safest and most sustainable manner for the environment and human use.
- Weed control goal is for each field to have < 20 % weeds throughout the year.

Park	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec
Town Hall Ball Field Outfield			A/G	B		C	I		D/J/K			
Town Hall Ball Field Infield Skin				E/F		E/F						
Town Hall Multi-Purpose Field			A/G	B		C			D/J/K			
Town Hall Nature Trail					E/F	E/F		E/F				
Polk Valley Ball Field Outfields			A/G	B		C	I		D/J/K			
Polk Valley Ball Field Infields Skins				E/F		E/F						
Polk Valley Ball Field Warning Tracks & Dugouts				E/F		E/F						
Polk Valley Multi-Purpose Fields			A/G	B		C	I		D/J/K	H		
Southeastern Ball Field Outfield			A/G	B		C			D/J/K			
Southeastern Ball Field Infield Skin				E/F		E/F						
Steel City Ball Field Outfield												
Steel City Ball Field Infield Skin												
Heller Homestead Barn Ruins				E/F		E/F						
Easton Road Ball Field Outfield			A/G	B		C			D/J/K			
Easton Road Ball Field Infield Skin				E/F		E/F						
Kingston Park												
Dog Park			A/G	B/J/K		C			D/J/K			
Reading Drive Trailhead			J/K			C	I		D/J/K			

Legend	
A	= Pre-emergent herbicide and complete fertilizer at .75 lbs N/ 1,000 ft ² *
B	= Late spring pre-emergent herbicide, .5 lbs N/1000 ft ² and broadleaf weed herbicide. *
C	= Early summer .5 lbs N/1000 ft ² , broadleaf weed herbicide if needed, and post emergent crabgrass herbicide if significant young crabgrass is present.
D	= Early Sept complete fertilizer at 1.25 lbs N/1000 ft ² , broadleaf weed herbicide.
E	= Pre-emergent vegetation control.
F	= Post-emergent vegetation control with a non-selective herbicide.
G	= Get soil tested for P, K and pH every 2 years. Adjust fertility program accordingly
H	= Complete fertilizer at 1.0 lbs N/1000 ft ²
I	= Apply preventative grub control (Imidacloprid) late June/early July
J	= Overseeding (refer to Aeration)
K	= Core Aeration (refer to Aeration)

* If any seeding is to be done in Spring, then a Pre-emergent herbicide must not be applied. Instead, a post-emergence crabgrass herbicide (i.e. Drive or Tenacity) must be used after at least 3 mowings of any new grass. Areas without crabgrass do not need to be sprayed.

** Similar herbicides may be substituted for those listed above as long as they control the weeds (< 20 % weeds/field) and fit-in with any seeding.

- * *If any seeding is to be done in Spring, then a Pre-emergent herbicide must not be applied. Instead, a post-emergence crabgrass herbicide (i.e. Drive) must be used after at least 3 mowings of any new grass. Areas without crabgrass do not need to be sprayed.*
- ** *Similar herbicides may be substituted for those listed above as long as they control the weeds (< 20 % weeds/field) and fit-in with any seeding.*

D. Inspections

Inspections of all parks should be done once per week by the Public Works Department. Play equipment inspections should be conducted monthly and a written log should be kept on file. Public Works staff should attend training given by the Pennsylvania Playground Safety Institute.

All site furniture, signage, fencing and other structures should be annually inspected by the Public Works Department in the spring. These inspections should include all fencing, gates and hardware, backstops, benches, picnic tables, bleachers, garbage containers, signage, bollards, foul poles, mutt mitt dispensers, paving, stormwater management facilities, lighting, trails, pavilions, infield areas, and any other improvements made by Lower Saucon Township.

E. Integrated Pest Management (IPM)

Lower Saucon Township is committed to a comprehensive Integrated Pest Management (IPM) program guiding the management of its parks, landscaped areas, and other essential public lands.

The purpose of this IPM program is to ensure and enhance the health, safety and welfare of citizens, visitors, and Township staff by clearly defining the Township's pest management strategy, the priorities for administering this strategy, and the various means by which these priorities may be realized.

The Township, in carrying out its pest management operations, shall focus on long term prevention or suppression of pest problems with minimum negative impact on human health, non-target organisms, and the environment. To this end, preference shall be given to reasonably available non-chemical alternatives before considering the use of chemicals on township property.

IPM Procedures

IPM relies on pest monitoring and the most economical and least hazardous combination of cultural, physical, biological, and/or chemical controls to prevent unacceptable levels of pest activity and damage. The Township will develop a site plan for each park that may experience pest problems. These plans will incorporate IPM and outline specific management tactics. The full range of management options, including no action at all, will be considered. The choice of using a pesticide is based on a review of all other available options and a determination that these options are not acceptable or are not feasible. Non-chemical pest management methods are used whenever possible. These methods include, but are not limited to:

- Top-dressing turf with compost and aerifying the soil two times per year.
- Use of organic products such as corn gluten meal as a pre-emergent to prevent weeds, vinegar as a chemical edging around trees and along fences, and orange oil as an insecticide. Corn gluten is expensive and is marginally effective at weed control.

- Beneficial insects such as lady bugs and praying mantis will be introduced to control other damage by other insects.
- Mowing at the proper height and frequency to discourage weeds.
- Shredding grass clippings and leaves and returning them to the soil.
- Returning "No Mow" areas to pasture with native grasses and wildflowers.

Direct action will be used only when specific pest thresholds are reached. When it is determined that a chemical must be used, the least hazardous material and method of application will be chosen. Chemical applications will be timed to minimize their impact on park grounds. All chemicals will be handled according to state and federal law.

Pest Management Objectives

- Maintain a safe and sustainable recreational environment.
- Protect human health by suppressing pests that threaten public health and safety.
- Reduce exposure of humans, particularly children, to chemicals.
- Reduce or prevent pest damage to park properties.
- Reduce environmental pollution.
- Reduce the costs of pest management.
- Prevent pests from spreading beyond Township property.
- Enhance the quality of life for Township residents.

IPM Coordinator

The Township will appoint an IPM Coordinator responsible for overseeing implementation of the IPM Policy and site plans. The Coordinator's responsibilities will include:

- Recording all pest sightings by Township staff and local residents.
- Recording all chemical use and making those records available.
- Making chemical labels and material safety data sheets for all products applied available.
- Coordinating management activities with pest control contractors.
- Approving appropriate chemicals applications—methods, materials, timing, and location.
- Assuring that all of the pest control contractor's recommendations on maintenance and sanitation are carried out where feasible.
- Posting and notification of chemical application.
- Evaluating the Township's progress in implementing the IPM plan.

Education

The local community should be educated about potential pest problems and IPM methods used to achieve the pest management objectives. From the very beginning, IPM should involve people from all segments of the community.

Record Keeping

Pest sighting data sheets and pest control records will be kept current and accessible to verify the need for treatments and track the effectiveness of management activities. The Township shall maintain these records for a period of four (4) years, and shall make the information available to the public, upon request. Application records shall include at least the following information: site of application, date of application, target pest, name of the product and

active ingredient of the chemical(s) applied, EPA registration number, and amount of product applied.

F. Irrigation

There are currently no irrigation facilities for any of the Township playing fields.

G. Litter Control

Trash containers should be checked twice per week during peak season and once per week off-season by the Public Works Department. Extremely high use may dictate more frequent pick-ups for special events. Containers should be serviced as well.

H. Maintenance of Nursery Stock

Routine maintenance of all nursery stock planted at Township parks by trained authorized Township representatives will be necessary on an annual basis. Routine removal and replacement of dead nursery stock will be necessary on an annual or semi-annual basis. The consulting agronomist or Public Works should inspect all landscaping every summer in order to prepare for replacement plantings in the spring or fall. Dead plants should be immediately removed. In addition, the removal of sucker growth from nursery stock trees should occur periodically throughout the year.

Pruning shall be done on an as needed basis in response to wind, snow or ice damage, vandalism or other unforeseen events. Pruning of dead wood shall take place after plants are in full leaf. Pruning in order to reduce the size or change the shape of a plant in order to clear a path should be performed in the summer, after new growth has ceased. All pruning should be done in accordance with ANSI pruning standards.

I. Mulching

Mulch should be applied to all landscape areas not intended to be covered in grass (turf grass or natural areas). Mulch helps retain soil moisture, moderate soil temperature, prevent erosion and the washing away of nutrients, and keeps unwanted plants from growing.

- Mulch should be kept no more than 2" to 3" deep.
- A flat layer of shredded hardwood bark should be provided over the root zone of all plantings in the spring.
- The previous year's mulch should be removed and discarded prior to re-mulching.
- The excessive piling of mulch against the trunk (e.g. volcano mulching) shall not be done. Mulch should not touch the trunk of the tree.

J. Management of Non-Native and Invasive Species

The parks contain many natural areas, many of which are directly adjacent to residential areas. These areas may be particularly susceptible to contact with non-native or invasive species as they are exposed to seeds from neighboring garden plants. Disturbed or newly created forest edges such as these are often more susceptible to invasive plants as well. Park natural areas should be inspected annually by a designated Township representative in order to identify any non-native or invasive species in order to eradicate them before they can

spread further. Species of particular concern include those identified on the most recent "Invasive Plants in Pennsylvania" list prepared by Pennsylvania DCNR, attached hereto.

The planting of any material on lands owned by Lower Saucon Township is expressly prohibited unless written permission has been granted by the Township and only when native species of plants are used.

K. Mowing

Athletic Fields and Recreational Turf Areas

Grass in all Township parks will be mowed during the April – September period in accordance with the following chart.

- Mow when the grass is dry.
- If the grass gets too high, mow over the clippings a second time to further shred and scatter them.
- To prevent excess growth between mowings, raise the mower height, mow, then gradually lower it over a span of several mowings. This will help prevent shock to the plants.
- In areas that may be damaged by contact from mowers, such as in the vicinity of fencing, nursery stock and other improvements, string trimmers shall be used. NOTE: "Trimmers are not recommended at base of tree trunks, but only at the edges of mulched areas around trees. Any weeding that needs to be done within the mulched zone, needs to be done by hand so as not to debark the trees."

Park	Field	Grass Present	Mowing Height	Mowing Frequency
Town Hall Park*	Non Field Areas		2.5 to 4.5	Weekly
	Ball Field		2.5 to 3.5	***
	Multi-purpose		2.5 to 3.5	***
Polk Valley Park**	Non Field Areas		2.5 to 4.5	Weekly
	Soccer/Football		2.5 to 3.5	***
	Soccer/Football		2.5 to 3.5	***
	Soccer/Football		2.5 to 3.5	***
	Baseball		2.5 to 3.5	***
	Baseball		2.5 to 3.5	***
	Dog Park		2.5 to 4.5	Weekly
	Natural Areas		****	****
Southeastern Park	Non Field Areas		2.5 to 4.5	Weekly
	Baseball		2.5 to 3.5	***
	Meadow		****	****
Steel City Park	Non Field Areas		2.5 to 4.5	Weekly
	Baseball		2.5 to 3.5	***
Heller Homestead Park	Grass Areas		2.5 to 4.5	Weekly
Kingston Park	Grass Areas		2.5 to 4.5	Weekly
	Meadow		****	****
Easton Road	Ball Field		2.5 to 3.5	***
	Grass Areas		2.5 to 4.5	Weekly

- * Town Hall Park must be cut in one (1) day or two (2) consecutive days but not on a Saturday or Sunday unless approved by the Public Works Director
- ** Polk Valley Park must be cut in a consecutive two-day period.
- *** The mowing height and frequency in all athletic playing field areas shall be determined by the Director of Public Works by taking into account the rate of growth to be able to maintain a height of between 2.5" to 3.5" without removing more than the top 3rd of the blade.
- **** Meadows and Naturalized Areas should be mowed to a height of 4"-6" once annually in early spring prior to April 1st (with prior Township approval). If that date cannot be accomplished the mowing may instead be done between July 5th and July 31st. A minimum 2' unmown buffer must be left around flagged trees and shrubs.

L. Equipment Maintenance

- Only sharp mower blades shall be used. Dull mowers tear the grass blade, injure the plant and cause a brownish cast to the turf.
- Equipment (mowers, trimmers, etc.) should be cleaned on a daily basis to minimize the spread of invasive species.

M. Overseeding

Overseeding areas on athletic fields should be done in late summer (early Sept) in conjunction with aerating using a seed mix that contains greater than 60% Perennial ryegrass or a blend of 2-4 perennial ryegrass varieties. All seed should be less than 1 year old and applied at 4 to 5 pounds seed/1000 ft².

N. Slit-Seeding

Bare areas shall be slit-seeded at the rate of 8 to 10 lbs seed/1000 ft² as needed according to the seed recommendations list above.

O. Repairs

Repairs to all park elements should be done immediately upon discovery provided replacement parts are available to accomplish the job. When disruption to the public from the repair would be major and the repair is not critical, repairs may be postponed to a time period which is the least disruptive.

P. Snow Removal

The Public Works Department will plow the main entrances and roads in Township parks in the event of accumulations of ½ inch or more. Minimal plowing of parking lots in Township parks will occur for winter recreation. Minimal applications of snow melting compound and/or gravel as appropriate to reduce the danger of injury due to falls and safe winter access to park.

Q. Surfaces

Sweeping, cleaning and washing of surfaces needs to be done by the Public Works Department so that at no time does an accumulation of dirt and leaves distract from the looks or safety of the area. Pervious concrete walkways must be kept clear to dirt and leaves to promote infiltration. Repainting or restaining of structures should occur when weather or wear has deteriorated the appearance of the covering. Stains to surfaces should be taken off within five (5) working days. Graffiti should be washed off or painted over the next working day after discovery.

R. Weed Control

Manual Removal

Weeds and invasive plants shall be removed manually whenever possible. This shall be the preferred method of plant removal. The use of weed wrenches, root talons, frail mowers, brush hogs, girdling and hand removal are examples of several methods that could be used.

- A chemical herbicide may be used on some invasives, such as autumn olive and tree-of-heaven, which will re-grow thicker if cut or pulled.
- Invasive plants should not be removed while they are in seed. Disturbance during such times may aide in the spreading of the invasive plants.
- Heller Homestead Barn Ruin area shall be free of invasive trees and shrubs, especially in the area on the west side of the ruins.

Chemical Removal

Herbicides shall only be used when and where they contribute to the perpetuation of species, communities, and ecosystems targeted for preservation or when they provide the most efficient and/or environmentally compatible method for control of plants that 1) could be hazardous to staff and visitors, or 2) are designated as "noxious" species requiring control.

Use of Chemicals

- Chemicals shall be used only in situations where benefits of controlling targeted "pests" outweigh overall risks of using herbicides and other methods are prohibitively expensive, not effective, or more likely to cause unintended damage than the herbicide.
- Chemicals shall be used only in a manner consistent with labeling instructions.
- Chemicals shall be used only in compliance with all federal, state and local regulations, including those related to licensing and/or certification of applicators, use of protective and safety gear, and posting requirements.
- Chemical purchases shall be limited to the amount needed for use during the year.
- Chemicals shall be stored in an appropriate, secure site that is not accessible to unauthorized personnel.
- Chemicals shall be disposed of in accordance with label directions and state regulations.
- The Township shall notify the public of chemical applications at specific locations. Notification locations shall be those places where there is a high level of public contact with the landscape. Notification shall be accomplished by posted signs at reasonable entry point locations. Notices shall include the product name, EPA Registration # (if applicable),

and contact phone number for more information. Notices shall be posted prior to chemical application and shall remain in place for at least 24 hours.

S. Composting

Compost is the result of a controlled process of decomposition, and can consist of materials such as grass clippings, dead leaves, shredded newspaper and manure from herbivorous animals.

The steps to composting shall be as follows:

1. Add three parts "browns", which can be dead leaves, straw, shredded paper, wood chips, sawdust, and pine needles. It should be noted that wood chips, sawdust or other material from plants with insect infestation, i.e. the elm bark beetle, should not be used for composting but should be disposed in a manner that will ensure that the infestation does not spread to other plant material.
 2. Add one part "greens", which can be grass clippings, vegetable and fruit waste, eggshells, coffee grounds and filters, and manure.
 3. Mix or layer materials. After every 12 inches add a few shovels of soil.
 4. It should be kept damp and aerated, and within a few months there will be compost to be used.
- Compost should be warm and moist to the touch but not soggy.
 - Compost should be turned regularly to keep it aerated (every three days to six weeks, depending on the thickness of the compost), in order to keep odors down.
 - Compost should be ready in 2 to 4 months.
 - Apply compost to new planting beds at a depth of 1" to 3" of compost into the top 6" to 12" of soil; or add ¼" to ½" of compost around existing plants in the spring and fall.