URBAN FORESTRY AND STREET TREES UPDATE

Environmental Quality & Public Works Committee May 18, 2021





Topics

- Urban Forestry Organizational Chart
- Background on Street Trees in Lexington
- Hazardous Street Tree Cost Share Program
- Street Tree Clearance Pruning Program
- Major Forestry Enhancement Initiatives
- Path Forward / Future Initiatives
- Questions?



Urban Forestry Organizational Chart

E							
	AGER Saylor	MANAGER Demetria Mehlhorn	Streets and Roads				
PUBLIC TREES CITY ARBORIST Heather Wilson ARBORISTS Nathan Skinner Scott Tyree ARBORIST TECHNICIAN Vacant TREE NURSERY	PRIVATE TREES COMPLIANCE URBAN FORESTER Tim Queary ARBORIST TECHNICIAN Rob Ballard	PRIVATE TREES ENFORCEMENT ENVIRONMENTAL ENFORCEMENT SPECIALIST Ben Cornett	EMERGENCIES & RURAL ROADS MANAGER Kevin Dennis TREE CREW SUPERVISOR Greg Taulbie				
MANAGER Kent Slusher FORESTRY & HORTICULTURE CREWS	APPEALS BOARDS TREE BOARD: Decisions of Urban Forester INFRASTRUCTURE HEARING BOARD: Enforcement Actions						



Publicly Maintained Street Trees (~10%)







Privately Maintained Street Trees (~90%)

• Property Owners responsible, city programs assist





Privately Maintained Street Trees (~90%)

Example of Street Trees planted in the 2000s





Privately Maintained Street Trees (~90%)

Example of Street Trees planted in a Street Tree Easement





Hazardous Street Tree Cost Share Program

- Provides 50/50 cost share for hazardous tree removal and replacement
- Owner occupied urban residential properties only
- Low income assistance available at 100%
- Requires removal and replacement with acceptable tree in a suitable location (when appropriate)
- Property owner obtains competing quotes from City pre-qualified certified arborist vendors, gets approval from Urban Forester, then has work performed
- Follow-up inspection by Arborist Technician prior to reimbursement



Hazardous Street Tree Cost Share Program

- FY15 FY20: 1,019 trees removed; 955 replaced
- FY 2020: Original budget was \$150,000; Program suspended due to pandemic in March 2020 after \$104,437 spent
- FY2021: Original budget not funded; \$50,000 allocated - \$36,360 has been paid out to date

LFUCG Assisted Hazardous Tree Removals by Council District

	1	2	3	4	5	6	7	8	9	10	11	12	TOTAL
FY2015	2	8	4	1	40	22	1	-	21	20	15	39	173
FY2016	-	10	4	8	19	50	15	5	4	9	13	20	157
FY2017	2	7	5	10	21	40	18	-	34	7	16	24	184
FY2018	2	1	4	5	33	45	7	3	20	13	7	23	163
FY2019	3	6	16	-	39	29	12	4	9	16	7	36	177
FY2020	0	3	14	2	19	26	8	10	15	40	4	24	165
TOTAL:	9	35	47	26	171	212	61	22	103	105	62	166	1019



Hazardous Street Tree Cost Share Program

Last 6 years – 1,019 trees removed with 955 replaced

LFUCG'S 50% Share of Expenses and Tree Removal Statistics FY2015 – FY2020

	# of Trees Removed	LFUCG \$ Expended	LFUCG \$/Tree Removed		
FY2015	173	\$61,439	\$355		
FY2016	157	\$73,906	\$471		
FY2017	184	\$101,407	\$551		
FY2018	163	\$96,128	\$590		
FY2019	177	\$129,192	\$730		
FY2020	165	\$96,873	\$587		
TOTAL:	1019	\$558,945			



Hazardous Street Tree Cost Share Program A Compliance Success Story

- Significant <u>reductions</u> in:
 - ✓ Ice storm damage
 - ✓ Hanging/falling limbs
 - ✓ Lexcalls related to dead and dying trees
 - ✓ Time from identification of hazard to removal of hazard
 - ✓ Staff time and costs related to enforcement and abatement
- Many positive comments from citizens
- Low Income Assistance is essential to providing safe environments



Street Tree Clearance Pruning Program





Street Tree Clearance Pruning Program

- 18,890 street trees pruned for clearance from FY2016 FY2020
- Certified Arborists on contract perform the work
- Work occurs mostly in the winter
- \$220,649 spent in FY2016 FY2020
- Average cost is increasing: \$10.85/tree (FY16-FY19)

\$13.84/tree (FY20)

FY2021 budget is ~\$65,000

	1	2	3	4	5	6	7	8	9	10	11	12	TOTAL
FY2016							94					-	94
FY2017	1				207	104	151					-	463
FY2018	318	2832	-	367	96	1133	275	284	245	220	347	-	6117
FY2019	-	1138	-	-	-	1468	3061	-	787	116	418	-	6988
FY2020	-	-	-	-	-	-	1732	23	1418	2055	-	-	5228
TOTAL:	319	3970	-	367	303	2705	5313	307	2450	2391	765	-	18890

2016 – 2020 Statistics by Council District



Street Tree Clearance Pruning Program Another Compliance Success Story

- Significant <u>reductions</u> in:
 - ✓ Ice and wind storm damage
 - Storm damage response and overtime expenditures in neighborhoods where pruning has occurred
 - ✓ Lexcalls related to trees blocking roads and sidewalks
 - ✓ Incidents of auto-pruning
 - ✓ Damage to waste trucks
 - ✓ Staff time and costs related to street tree compliance assistance
- Many positive comments from citizens few complaints



- i. Focus on Kentucky Native Trees & Shrubs
- ii. Growing our own stock of local Bluegrass phenotype trees and shrubs
- iii. Creating local seed bank saving seeds from historically significant trees in Fayette County
 - Bur oaks from Red Mile, Fayette Mall
 - Catalpa from Coolavin Park
 - Persimmon from Bell Place mansion
 - Shellbark hickory from Hisle Farm barn



- 1. Hisle Park Plant Nursery
 - ➤ ~10 acres
- 2. Masterson Station Plant Nursery
 - > ~3.5 acres
- 3. Reforest the Bluegrass Areas

4. Legacy Forests in Parks

- Partnership with Fayette County Public Schools
- Tree Week plantings in 5 parks to date Liberty Trail, Belleau Woods Park, Wellington Park, Highlands Park, Oakwood Park, Pine Meadows Park



5. Friends of Parks

- Partnership with Friends of Parks
- Plant around 125 trees annually at various locations, including Shillito Park, Coldstream Dog Park, Meadowbrook Greenway, and Deep Springs Greenway (2021)

6. Greenways, Greenspaces, and WQ Lots

- Giving our water quality/greenspace lots an identity and purpose
 - Pawpaw stand (pending)
 - Edible forest (pending)
 - The Walnut Grove at Liberty Road



Walnut Grove at Liberty Road

- Water quality lot on Liberty Road
- All black walnut 3,500 trees across 3.5 acres
- Seeds and seedlings locally collected – e.g.
 BCTC campus





Hisle Park Plant Nursery

2018 Beginnings

- Generous donation from Shooting Star Nursery and the Friends of Wolf Run
 - ✓ 2,638 trees
 - ✓ 3,338 shrubs
 - ✓ 3,970 perennials
 - ✓ 635 vines
 - ✓ 958 grasses
- All of these plants were transplanted within a year of receipt in city parks, greenspaces, or given to community groups for planting throughout Fayette County.



Hisle Park Plant Nursery





Hisle Park Plant Nursery

- ➤ ~10 acres
- ➢ Currently have 1,200 spots − 70% filled
- In 2020, 315 trees dug and transplanted for Tree Week, Reforest, and Fayette County Public Schools
- Tree species include sugar maple, yellow poplar, Kentucky coffeetree, and American basswood, red buckeye, eastern hophornbeam, Ohio buckeye
- Shrub varieties include Saskatoon serviceberry, red and black chokeberry, chokecherry, Carolina allspice, buttonbush





Hisle Park Plant Nursery

2019 Gravel Bed Expansion

- ⋟ \$6,345 grant from the Kentucky Division of Forestry
- Statewide demonstration project
- Staff constructed the 16' by 24' above-ground irrigated planting bed and filled it with sand and gravel.
- Planted 105 small, bare-root trees (35 sycamore, 35 sugar maple, and 35 black gum) in March
- Transplanted the bare root trees in November



2019 Gravel Bed Expansion



March October 2019 Gravel Bed Expansion



2019 Gravel Bed Expansion



Removing trees from gravel with healthy dense root mass

Hydrating root dip



2019 Gravel Bed Expansion



Planting bare root tree



Easy to transport Easy to plant Better health outcomes Native soil

Our gravel bed is producing 100 trees/year for transplant



Path Forward / Future Initiatives

- Expand resources as the public part of the urban forest grows e.g.
 Town Branch Commons and Versailles Road Streetscape.
- Continue nursery operations.
- Increase operational support for Div. of Water Quality projects for root cutting and tree protection.
- Provide consistent funding of Street Tree Cost Share Program (\$50k FY22 MPB) even if amount has to fluctuate.
- Continue Street Tree Clearance Pruning each winter.
- Consider initiation of a new Tree Canopy Assessment (last one completed based on 2012 fly-over data).
- Continue a comprehensive annual Council update on the urban forestry program.



