Total Projected Benefits (2019-2069) - Over the next 50 years, based on forecasted tree growth, i-Tree Design projects total benefits worth $70,866:

- $48,479 of stormwater runoff savings by intercepting 1,788,890 gallons of rainfall
- $973 of air quality improvement savings by absorbing and intercepting pollutants such as ozone, sulfur dioxide, nitrogen dioxide, and particulate matter; reducing energy production needs; and lowering air temperature
- $7,096 of savings by reducing 305,096 lbs. of atmospheric carbon dioxide through CO_2 sequestration and decreased energy production needs and emissions
- $3,558 of summer energy savings by direct shading and air cooling effect through evapotranspiration
- $10,761 of winter energy savings by slowing down winds and reducing home heat loss

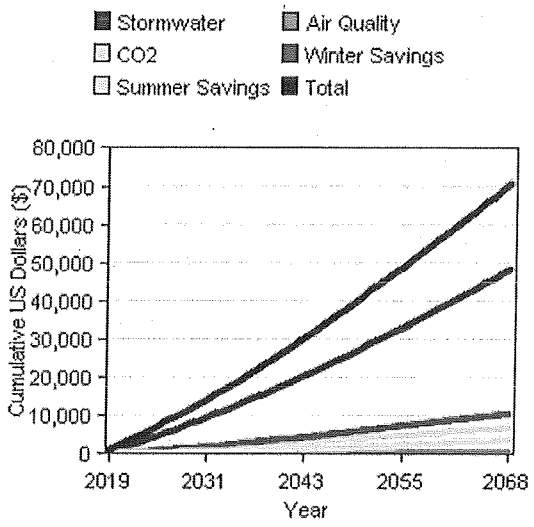

Figure 1. Tree benefit forecast for 50 years

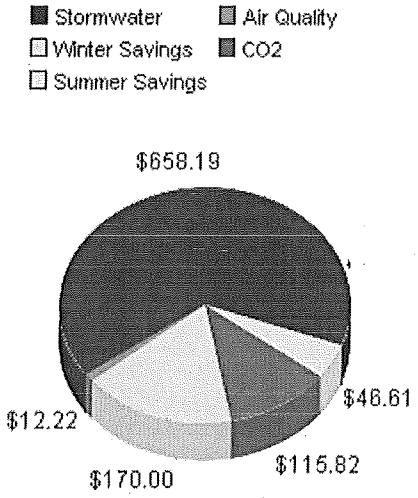

Figure 2. Annual tree benefits for 2019

Current Year - For 2019, i-Tree Design estimates annual tree benefits of $1,002.84:

- $658.19 of stormwater runoff savings by intercepting 24,288 gallons of rainfall
- $12.22 of air quality improvement savings
- $115.82 of carbon dioxide reduction savings
- $46.61 of summer energy savings
- $170.00 of winter energy savings

Future Year - In the year 2069, based on forecasted tree growth, i-Tree Design projects annual benefits of $1,713.28:

- $1,212.14 of stormwater runoff savings by intercepting 44,728 gallons of rainfall
- $25.41 of air quality improvement savings
- $151.69 of carbon dioxide reduction savings
- $79.48 of summer energy savings
- $244.56 of winter energy savings

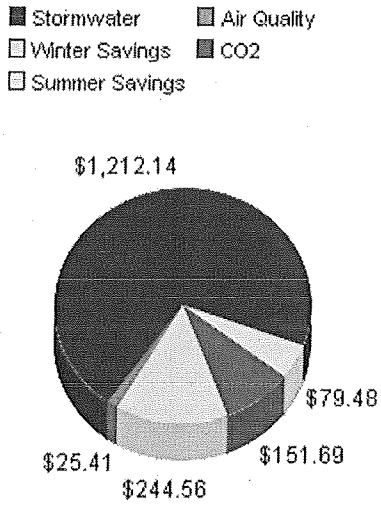

Figure 3. Annual tree benefits for the year 2069

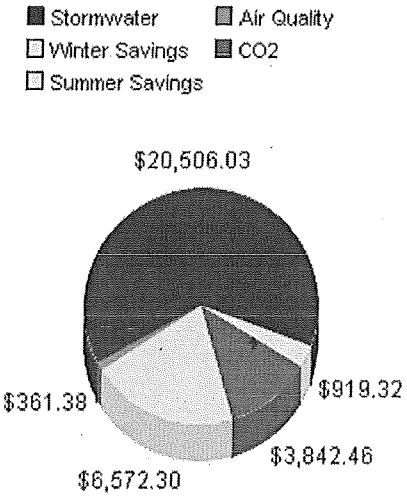

Figure 4. Total benefits to date

Total Benefits to Date - Over the life of the tree(s) so far, i-Tree Design calculates total benefits worth $32,201:

- $20,506 of stormwater runoff savings by intercepting 756,677 gallons of rainfall
- $361 of air quality improvement savings
- $3,842 of carbon dioxide reduction savings
- $919 of summer energy savings
- $6,572 of winter energy savings

Individual Tree Benefits							
Tree	DBH (in)	Condition	Location to Structure	Benefits			
				Current Year (2019)	Future Year (2069)	Projected Total (2019-2069)	Total to Date
1. Pear	4	Good	South (27 ft)	$0.53	$26.53	$820	$0
2. Norway maple	19	Good	Southeast (24 ft)	$83.89	$121.18	$5,283	$1,017
3. Littleleaf linden	11	Good	Southeast (21 ft)	$23.50	$114.89	$3,650	$237
4. Kentucky coffeetree	2	Good	East (20 ft)	$0.29	$29.93	$685	$0
5. Green ash	25	Good	Northeast (22 ft)	$137.25	$199.50	$8,469	$5,097
6. Littleleaf linden	34	Good	Northeast (24 ft)	$125.36	$127.58	$6,321	$9,842
7. Honeylocust	24	Good	Northeast (27 ft)	$149.76	$173.52	$8,553	$4,291
8. Honeylocust	30	Good	North (27 ft)	$173.83	$172.88	$8,674	$7,530
9. Honeylocust	16	Good	North (28 ft)	$72.27	$173.83	$6,754	$1,491
10. Norway maple	14	Poor	Northwest (11 ft)	$45.87	$91.69	$3,632	$539
11. Norway maple	13	Good	Northwest (13 ft)	$55.93	$129.67	$5,048	$560
12. Norway maple	12	Good	Northwest (12 ft)	$52.40	$128.61	$4,889	$473
13. Norway maple	9	Good	West (12 ft)	$26.34	$109.67	$3,650	$75
14. Norway maple	14	Good	West (43 ft)	$55.61	$113.79	$4,440	$1,048
Total				**$1,002.84**	**$1,713.28**	**$70,866**	**$32,201**

DBH: "diameter at breast height" is the standard measurement of tree trunk width at 4.5 feet (1.5 meters) above the ground.