Valhalla Brandywine Comparison of By-Right Plans vs. Proposed Plans

Agricultural / Residential / Industrial Use (By-Right Plan)

vs.

Proposed Active Recreation / Residential Design Site

Total Land and Class A Land Disturbance Comparison								
	Total Land Disturbance		Total Class A Land Disturbance		Total Class A Land Tilled *			
By-Right Plan	408.98	68.2%	44.63	10.9%	44.63	10.9%		
Proposed Active Recreation	147.96	24.7%	0.00	0.0%	0.00	0.0%		
Net Impact	-261.02	-43.5%	-44.63	-10.9%	-44.63	-10.9%		

Total Tree Removal Comparison							
	Total Trees to be Total Hard Tree Removed Removed						
By-Right Plan ** Proposed Active Recreation**	1533 238	58.6% 9.1%	879 152	55.3% 9.6%	654 86	63.6% 8.4%	
Net Impact	-1295	-49.5%	-727	-45.8%	-568	-55.3%	

	Impervious Coverage Comparison							
	Total Site Acres	Total Impervious Coverage SF ***	Total Impervious Coverage Acres					
By-Right Plan	599.62	1,846,072.80 7.1%	42.38 7.1%					
Proposed Active Recreation	599.62	1,675,317.60 6.4%	38.46 6.4%					
Net Impact	N/A	-170,755.20 -0.7%	-3.92 -0.7%					

^{*} By-Right Plans assumes Land to be tilled every year, while Proposed Active Recreation will be tilled only once when the golf course is built.

^{**} No Specimen Trees (24" and Greater) proposed to be removed

^{***} Total impervious coverage for Teir IV subdivision (by-right) is 1,802,512.8 s.f. (41.38 Acres).

Agricultural / Residential / Industrial Use (By-Right Plan)

	Total Area	Total Till	Total Tilled Area		Total Cleared Only		uilding	Total Dis	turbed
	(Ac.)	(Ad	c.)	Area	(Ac.)	Area	(Ac.)	Area (Ac.)
Wet Soils	97.67	27.50	28.2%	0.00	0.0%	0.00	0.0%	27.50	28.2%
Floodplain	4.88	0.00	0.0%	0.00	0.0%	0.00	0.0%	0.00	0.0%
50' Stream Setback	47.33	0.00	0.0%	0.00	0.0%	0.00	0.0%	0.00	0.0%
Waters	29.48	0.00	0.0%	0.00	0.0%	0.00	0.0%	0.00	0.0%
Wetlands	37.21	0.00	0.0%	0.00	0.0%	0.00	0.0%	0.00	0.0%

Note: Percentages shown are based on total area of individual feature

	Total Area (Ac.)	Tilled Area (Ac.)		Cleared Only (Ac.)		Building (Ac.)		Total Disturbed (Ac.)	
Wet Soils ¹	97.67	27.	27.50		0.00		00	27.50	
Floodplain ²	2.13	0.0	00	0.0	00	0.0	00	0.00	
50' Stream Setback ³	16.97	0.0	00	0.0	00	0.0	00	0.00	
Waters ⁴	1.62	0.0	00	0.0	00	0.0	00	0.00	
Wetlands ⁵	2.39	0.0	00	0.0	00	0.0	00	0.00	
Total FHWSD	120.78	27.50	22.8%	0.00	0.0%	0.00	0.0%	27.50	22.8%
Steep Slopes 20% 6	26.05	17.13	0.66	0.00	0.00	0.00	0.00	17.13	65.8%
Total Class A ***	146.83	44.63	30.4%	0.00	0.0%	0.00	0.0%	44.63	30.4%
Total Lands	599.62	399.86	66.7%	0.00	0.0%	9.11	1.5%	408.98	68.2%

^{**} Areas for each feature are calculated as follows:

¹ This area includes all impacted areas of wet soils (Worsham and Wehadkee soils)

² This area is for all floodplain areas that exist outside of the wet soils area.

³ This area is for all 50 foot stream/waterbody setbacks that exist outside of wet soils or flood plain areas

⁴ This area is for all streams/waterbodies that exist outside of wet soils or flood plain areas

⁵ This area is for all wetlands that exist outside of wet soils areas, flood plain areas, 50' stream setbacks, and streams/waterbodies

⁶ This area is calculated as Steep Slopes areas 20% and greater outside the FHSWD

^{***} Per SLDO Section 402.B.1.a, Class A Lands Include all Flood Plains, wetlands (i.e. FHWSD) and slopes over 20%. FHWSD is defined by Z.O. Section 802.A as including 100 year flood plain (per FEMA), hydric soils (worsham and wehadkee soils), all water bodies and areas within 50 ft and wetlands.

Proposed Active Recreation / Residential Design

	Total Area	Total Tilled Area		Total Cleared Only		Total B	uilding	Total Dist	turbed
	(AC.)	(Ad	c.)	Area	(Ac.)	Area	(Ac.)	Area (Ac.)
Wet Soils	97.67	0.00	0.0%	0.00	0.0%	0.00	0.0%	0.00	0.0%
Floodplain	4.88	0.00	0.0%	0.00	0.0%	0.00	0.0%	0.00	0.0%
50' Stream Setback	47.33	0.00	0.0%	0.00	0.0%	0.00	0.0%	0.00	0.0%
Waters	29.48	0.00	0.0%	0.00	0.0%	0.00	0.0%	0.00	0.0%
Wetlands	37.21	0.00	0.0%	0.00	0.0%	0.00	0.0%	0.00	0.0%

* Percentages base on Total Area of individual Feature

	0.00	Tilled Ar	ea (Ac.)	Cleared C	Only (Ac.)	Buildin	g (Ac.)	Total Dis	
Wet Soils ¹	97.67	0.00		0.00		0.00		0.00	
Floodplain ²	2.13	0.00		0.00		0.00		0.00	
50' Stream Setback ³	16.97	0.00		0.00		0.00		0.00	
Waters ⁴	1.62	0.00		0.00		0.00		0.00	
Wetlands ⁵	2.39	0.00		0.00		0.00		0.00	
Total FHWSD	120.78	0.00	0.0%	0.00	0.0%	0.00	0.0%	0.00	
Steep Slopes 20% 6	26.05	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.0%
Total Class A ***	146.83	0.00	0.0%	0.00	0.0%	0.00	0.0%	0.00	0.0%
Total Lands	599.62	147.96	24.7%	0.00	0.0%	0.00	0.0%	147.96	24.7%

^{**} Areas for each feature are calculated as follows:

¹ This area includes all impacted areas of wet soils (Worsham and Wehadkee soils)

 $^{^{2}\,}$ This area is for all floodplain areas that exist outside of the wet soils area.

³ This area is for all 50 foot stream/waterbody setbacks that exist outside of wet soils or flood plain areas

⁴ This area is for all streams/waterbodies that exist outside of wet soils or flood plain areas

⁵ This area is for all wetlands that exist outside of wet soils areas, flood plain areas, 50' stream setbacks, and streams/waterbodies

 $^{^{\}rm 6}\,$ This area is calculated as Steep Slopes areas 20% and greater outside the FHSWD

^{***} Per SLDO Section 402.B.1.a, Class A Lands Include all Flood Plains, wetlands (i.e. FHWSD) and slopes over 20%. FHWSD is defined by Z.O. Section 802.A as including 100 year flood plain (per FEMA), hydric soils (worsham and wehadkee soils), all water bodies and areas within 50 ft and wetlands.

Proposed Agricultural Use / Farmland / Industrial Use (By-Right Plan)

Steep Slope (20% and up calculation)

	Total (Ac.)	Tilled (Ac.)	Cleared Only (Ac.)	Building (Ac.)	Total Disturbed (Ac.)
Steep Slopes	32.31	18.95	0.00	0.00	18.95
	32.31	18.95	0.00	0.00	18.95
	Total Outside FHWSD	Tilled Outside	Cleared Outside	Building Outside	Disturbed Outside
	(Ac.)	FHWSD (Ac.)	FHWSD (Ac.)	FHWSD (Ac.)	FHWSD (Ac.)
Steep Slopes	26.05	17.13	0.00	0.00	17.13
	26.05	17.13	0.00	0.00	17.13

Proposed Proposed Active Recreation / Residential Design

Steep Slope (20% and up calculation)

Steep Slope (20% and up calculation)								
	Total (Ac.)	Tilled (Ac.)	Cleared Only (Ac.)	Building (Ac.)	Total Disturbed (Ac.)			
Steep Slopes	32.31	0.00	0.00	0.00	0.00			
	32.31	0.00	0.00	0.00	0.00			
	Total Outside FHWSD	Tilled Outside	Cleared Outside	Building Outside	Disturbed Outside			
	(Ac.)	FHWSD (Ac.)	FHWSD (Ac.)	FHWSD (Ac.)	FHWSD (Ac.)			
Steep Slopes	26.05	0.00	0.00	0.00	0.00			
	26.05	0.00	0.00	0.00	0.00			

Agı	Agricultural / Residential / Industrial Use (By-Right Plan)								
Total Trees	<u>Total on Site</u>	<u>To Remain</u>	To be Removed	% to be Removed					
18" to 21"	1646	340	1306	79.34%					
22" to 23"	272	45	227	83.46%					
24" and Up	699	699	0	0.00%					
Total	2617	1084	1533	58.58%					

Hardwood Trees	<u>Total on Site</u>	<u>To Remain</u>	To be Removed	% to be Removed
18" to 21"	939	209	730	77.74%
22" to 23"	173	24	149	86.13%
24" and Up	477	477	0	0.00%
Total	1589	710	879	55.32%

Softwood Trees	<u>Total on Site</u>	<u>To Remain</u>	To be Removed	% to be Removed
18" to 21"	707	131	576	81.47%
22" to 23"	99	21	78	78.79%
24" and Up	222	222	0	0.00%
Total	1028	374	654	63.62%

Proposed Active Recreation / Residential Design							
Specimen Tree Calculation							
Total Trees	<u>Total on Site</u>	<u>To Remain</u>	To be Removed	<u>% to be Removed</u>			
18" to 21"	1646	1448	198	12.03%			
22" to 23"	272	232	40	14.71%			
24" and Up	699	699	0	0.00%			
Total	2617	2379	238	9.09%			

Hardwood Trees	<u>Total on Site</u>	<u>To Remain</u>	<u>To be Removed</u>	% to be Removed
18" to 21"	939	812	127	13.53%
22" to 23"	173	148	25	14.45%
24" and Up	477	477	0	0.00%
Total	1589	1437	152	9.57%

Softwood Trees	Total on Site	<u>To Remain</u>	To be Removed	% to be Removed
18" to 21"	707	636	71	10.04%
22" to 23"	99	84	15	15.15%
24" and Up	222	222	0	0.00%
Total	1028	942	86	8.37%