Chesapeake Fish Passage Prioritization - Dam Fact Sheet

CFPPP Unique ID: **VA_770** **BYRD PARK CANAL DAM**

Bay-wide Diadromous Tier	1
Bay-wide Resident Tier	7
Bay-wide Brook Trout Tier	N/A
NID ID	VA76001
State ID	770
River Name	James River and Kanawha Canal
Dam Height (ft)	14
Dam Type	Buttress
Latitude	37.537
Longitude	-77.4866
Passage Facilities	None Documented
Passage Year	N/A
Size Class	2: Small River (38.61 - 200 sq mi
HUC 12	Little Westham Creek-James Riv
HUC 10	Tuckahoe Creek-James River
HUC 8	Middle James-Willis
HUC 6	James
HUC 4	Lower Chesapeake

Landcover

NLCD (2011)	
% Impervious Surface in Upstream Drainage Area	11.08
% Natural Cover in Upstream Drainage Area	44.54
% Forested in Upstream Drainage Area	33.21
% Agriculture in Upstream Drainage Area	10.39
% Natural Cover in ARA of Upstream Network	62.34
% Natural Cover in ARA of Downstream Network	59.74
% Forest Cover in ARA of Upstream Network	34.68
% Forest Cover in ARA of Downstream Network	17.98
% Agricultral Cover in ARA of Upstream Network	9.86
% Agricultral Cover in ARA of Downstream Network	0.31
% Impervious Surf in ARA of Upstream Network	5.93
% Impervious Surf in ARA of Downstream Network	10.67

Chesapeake Conservancy (2016)	
% Tree Cover in ARA of Upstream Network	64.7
% Tree Cover in ARA of Downstream Network	42.74
% Herbaceaous Cover in ARA of Upstream Network	21.53
% Herbaceaous Cover in ARA of Downstream Network	15.94
% Barren Cover in ARA of Upstream Network	1.13
% Barren Cover in ARA of Downstream Network	0.09
% Road Impervious in ARA of Upstream Network	3.91
% Road Impervious in ARA of Downstream Network	6.72
% Other Impervious in ARA of Upstream Network	6.39
% Other Impervious in ARA of Downstream Network	6.4

Metric descriptions can be found at:
http://52.53.143.233/chesapeake-dev/plugins/barrier-prioritization-proto2/images/Metric_Glossary.pdf

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Network, System Type and Condition

Functional Upstream Network (mi)	128.88	Upstream Size Class Gain (#)	1
Total Functional Network (mi)	153.35	# Downsteam Natural Barriers	0
Absolute Gain (mi)	24.47	# Downstream Hydropower Dams	2
# Size Classes in Total Network	4	# Downstream Dams with Passage	2
# Upstream Network Size Classes	3	# of Downstream Barriers	2

NFHAP Cumulative Disturbance Index	Very High
Dam is on Conserved Land	No
% Conserved Land in 100m Buffer of Upstream Network	3.86
% Conserved Land in 100m Buffer of Downstream Network	9.2
Density of Crossings in Upstream Network Watershed (#/m2)	1.66
Density of Crossings in Downstream Network Watershed (#/m2)	2.94
Density of off-channel dams in Upstream Network Watershed (#/m2)	0
Density of off-channel dams in Downstream Network Watershed (#/m2)	0

Diadromous Fish

Downstream Alewife	Current	Downstream Striped Bass	None Documented
Downstream Blueback	Current	Downstream Atlantic Sturgeon	None Documented
Downstream American Shad	Current	Downstream Shortnose Sturgeon	None Documented
Downstream Hickory Shad	None Documented	Downstream American Eel	Current

Presence of 1 or More Downstream Anadromous Species	Current
# Diadromous Species Downstream (incl eel)	4

Resident Fish

Barrier is in EBTJV BKT Catchment	No
Barrier is in Modeled BKT Catchment (DeWeber)	No
Barrier Blocks an EBTJV Catchment	No
Barrier Blocks a Modeled BKT Catchment (DeWeber)	No
Native Fish Species Richness (HUC8)	51
# Rare Fish (HUC8)	0
# Rare Mussel (HUC8)	3
# Rare Crayfish (HUC8)	0

Stream Health

Chesapeake Bay Program Stream Health	POOR
MD MBSS Benthic IBI Stream Health	N/A
MD MBSS Fish IBI Stream Health	N/A
MD MBSS Combined IBI Stream Health	N/A
VA INSTAR mIBI Stream Health	Very High
PA IBI Stream Health	N/A

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