Chesapeake Fish Passage Prioritization - Dam Fact Sheet

CFPPP Unique ID: VA_743 BONNEYS DAM

Bay-wide Diadromous Tier 4
Bay-wide Resident Tier 1
Bay-wide Brook Trout Tier N/A

NID ID VA07510

State ID 743

River Name

Dam Height (ft) 15

Dam Type Earth
Latitude 37.7844

Longitude -78.0572

Passage Facilities None Documented

Passage Year N/A

Size Class 1a: Headwater (0 - 3.861 sq mi)

HUC 12 Lower Byrd Creek

HUC 10 Byrd Creek

HUC 8 Middle James-Willis

HUC 6 James

HUC 4 Lower Chesapeake







Landcover			
NLCD (2011)		Chesapeake Conservancy (2016)	
% Impervious Surface in Upstream Drainage Area	0.23	% Tree Cover in ARA of Upstream Network	74.41
% Natural Cover in Upstream Drainage Area	86.46	% Tree Cover in ARA of Downstream Network	79.1
% Forested in Upstream Drainage Area	58.98	% Herbaceaous Cover in ARA of Upstream Network	19.6
% Agriculture in Upstream Drainage Area	10.63	% Herbaceaous Cover in ARA of Downstream Network	15.73
% Natural Cover in ARA of Upstream Network	93.4	% Barren Cover in ARA of Upstream Network	0
% Natural Cover in ARA of Downstream Network	79.33	% Barren Cover in ARA of Downstream Network	0.1
% Forest Cover in ARA of Upstream Network	35.29	% Road Impervious in ARA of Upstream Network	0.83
% Forest Cover in ARA of Downstream Network	65.28	% Road Impervious in ARA of Downstream Network	0.6
% Agricultral Cover in ARA of Upstream Network	4.88	% Other Impervious in ARA of Upstream Network	0.56
% Agricultral Cover in ARA of Downstream Network	16.03	% Other Impervious in ARA of Downstream Network	0.78
% Impervious Surf in ARA of Upstream Network	0.19		
% Impervious Surf in ARA of Downstream Network	0.71		



Chesapeake Fish Passage Prioritization - Dam Fact Sheet CFPPP Unique ID: VA 743 **BONNEYS DAM** Network, System Type and Condition Functional Upstream Network (mi) Upstream Size Class Gain (#) O 4.45 Total Functional Network (mi) 5435.47 # Downsteam Natural Barriers 0 Absolute Gain (mi) 4.45 2 # Downstream Hydropower Dams # Size Classes in Total Network 6 # Downstream Dams with Passage # Upstream Network Size Classes # of Downstream Barriers 1 NEHAP Cumulative Disturbance Index Not Scored / Unavailable at this scale Dam is on Conserved Land Nο % Conserved Land in 100m Buffer of Upstream Network \cap % Conserved Land in 100m Buffer of Downstream Network 11.23 Density of Crossings in Upstream Network Watershed (#/m2) Density of Crossings in Downstream Network Watershed (#/m2) 0.84 Density of off-channel dams in Upstream Network Watershed (#/m2) Density of off-channel dams in Downstream Network Watershed (#/m2) Λ Diadromous Fish Downstream Alewife **Potential Current Downstream Striped Bass** None Documented Downstream Blueback **Potential Current** Downstream Atlantic Sturgeon None Documented Downstream American Shad None Documented None Documented Downstream Shortnose Sturgeon Downstream Hickory Shad None Documented Downstream American Eel Current One or More DS Anadromous Species Potential Curre # Diadromous Sp Dnstrm (incl eel) Resident Fish and Rare Species Stream Health Barrier is in EBTJV BKT Catchment No Chesapeake Bay Program Stream Health FAIR Barrier is in Modeled BKT Catchment (DeWeber) No MD MBSS Benthic IBI Stream Health N/A Barrier Blocks an EBTJV Catchment Yes MD MBSS Fish IBI Stream Health N/A Barrier Blocks a Modeled BKT Catchment (DeWeber) No MD MBSS Combined IBI Stream Health N/A



Very High

N/A

No

Yes

Native Fish Species Richness (HUC8)

Globally rare or fed listed fish/mussel sp HUC12

Globally rare or fed listed fish/mussel sp in

upstream or downstream functional network

Rare Fish (HUC8)

Rare Mussel (HUC8)

Rare Crayfish (HUC8)

51

0

3

0

No

Yes

VA INSTAR mIBI Stream Health

Rare fish or mussel sp in HUC12

Rare fish or mussel in upstream or

downstream functional network

PA IBI Stream Health