Rempel et al. 2012: Velocity and Chinook HSI (USFWF)

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Species Information

Common Name: Chinook Salmon
Genus: Oncorhynchus tshawytscha

Stressor Details

Stressor Name: Velocity
Units: m/s
Metric: Flow velocity
Scale: linear
Function Type: continuous

Life Stage & Context

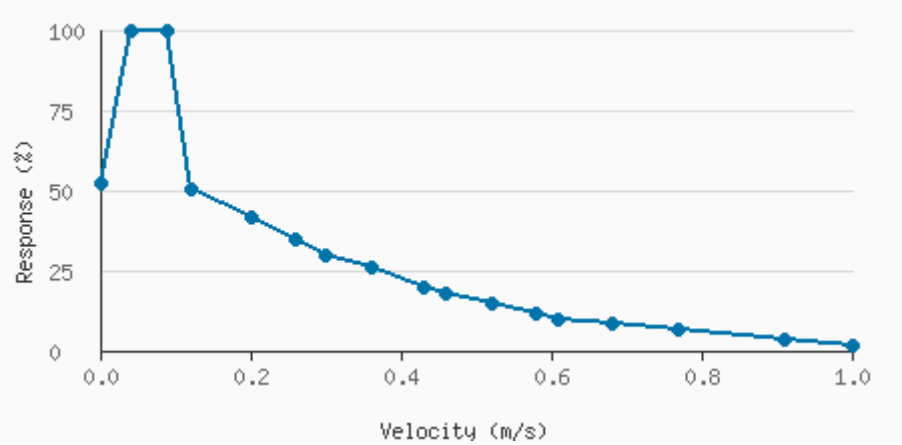
Life Stages: Fry

Descriptions

Overview

> Suitable velocity for Fraser fish is also similar to the WUP curve and identifies low-velocity habitat up to 35 cm/s as highly suitable. Maximum suitability extends to lower velocities for Fraser fish (5 cm/s) compared to the WUP curve.

Stressor Response Data



Stressor (X)	Mean System Capacity (%)	SD	low.limit	up.limit
-0.00	52.37	0.00	52.37	52.37
0.04	100.00	0.00	100.00	100.00
0.09	100.00	0.00	100.00	100.00
0.12	50.07	0.00	50.07	50.07
0.20	41.45	0.00	41.45	41.45
0.26	34.55	0.00	34.55	34.55
0.30	29.96	0.00	29.96	29.96
0.36	25.65	0.00	25.65	25.65
0.43	19.90	0.00	19.90	19.90
0.46	17.89	0.00	17.89	17.89

0.52	14.73	0.00	14.73	14.73
0.58	11.28	0.00	11.28	11.28
0.61	9.84	0.00	9.84	9.84
0.68	8.41	0.00	8.41	8.41
0.77	6.39	0.00	6.39	6.39
0.91	3.52	0.00	3.52	3.52
1.00	1.51	0.00	1.51	1.51

Citations

Rempel, L. L., Healey, K., & Lewis, F. J. A. (2012). Lower Fraser River juvenile fish habitat suitability criteria. Ecosystem Management Branch, Fisheries and Oceans Canada.

References

Rempel 2012 - https://www.ecofishresearch.com/wp-content/uploads/2016/09/346413.pdf