CENWP-OD 06 December 2021

MEMORANDUM FOR THE RECORD

**TITLE** - 21HCR02 MFR Hills Creek Minimum Flows

**NOTIFICATION DATE** - 07 December 2021

**PROJECT** - Hills Creek Dam

**RESPONSE DATE** - 21 December 2021

**Description of the problem**

On December 5 and 11, 2021, flows below Hills Creek Dam decreased to 347 cfs and 355 respectively while going from generation flow to discharge through the regulating outlet. The minimum flow criteria detailed in the Biological Opinion (BiOp) is 400 cfs. On December 14 and 16, 2021, there were ramp rate deviations of -0.32 ft/hr and 0.24 ft/hr, respectively.

**Dates of impacts/repairs**

December 5 and 11, 2021 (below minimum flows), December 14 and 16, 2021 (ramp rate deviations)

**Length of impacts/repairs**

~ 1 hours

**Expected impacts on fish**

Minimal to no impacts to fish

**Comments from agencies**

Please email or call with questions or concerns.

Chris Walker

NWP Operations Division Fishery Section

Willamette Fish Operations Biologist

503.808.4316

Christopher.E.Walker@usace.army.mil