

Standard Checklist

Name of Riparian-Wetland Area: Hitchcock Creek

Date: June 14, 2004 Segment/Reach ID: Reach 18 PFC 318

Miles: _____ Elevation: 553 GPS: N 36, 27. 516' W 121, 43. 930'

ID Team Observers: Clive Sanders, Danica Zupic Time: _____

Yes	No	N/A	HYDROLOGY
<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	1) Floodplain above bankfull is inundated in "relatively frequent" events
<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	2) Where beaver dams are present they are active and stable
<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	3) Sinuosity, width/depth ratio, and gradient are in balance with the landscape setting (i.e., landform, geology, and bioclimatic region)
<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	4) Riparian-wetland area is widening or has achieved potential extent
<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	5) Upland watershed is not contributing to riparian-wetland degradation

Yes	No	N/A	VEGETATION
<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	6) There is diverse age-class distribution of riparian-wetland vegetation (recruitment for maintenance/recovery)
<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	7) There is diverse composition of riparian-wetland vegetation (for maintenance/recovery)
<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	8) Species present indicate maintenance of riparian-wetland soil moisture characteristics
<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	9) Streambank Vegetation is comprised of those plants or plant communities that have root masses capable of withstanding high-streamflow events
<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	10) Riparian-wetland plants exhibit high vigor
<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	11) Adequate riparian-wetland vegetative cover is present to protect banks and dissipate energy during high flows
<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	12) Plant communities are an adequate source of coarse and/or large woody material (for maintenance/recovery)

Yes	No	N/A	EROSION/DEPOSITION
<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	13) Floodplain and channel characteristics (i.e., rocks, overflow channels, coarse and/or large woody material) are adequate to dissipate energy
<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	14) Point bars are revegetating with riparian-wetland vegetation
<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	15) Lateral stream movement is associated with natural sinuosity
<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	16) System is vertically stable
<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	17) Stream is in balance with the water and sediment being supplied by the watershed (i.e., no excessive erosion or deposition)

Summary Determination

Functional Rating:

Proper Functioning Condition
Functional—At Risk
Nonfunctional
Unknown

<input type="checkbox"/>
<input type="checkbox"/>
<input checked="" type="checkbox"/>
<input type="checkbox"/>

Trend for Functional—At Risk:

Upward
Downward
Not Apparent

<input type="checkbox"/>
<input checked="" type="checkbox"/>
<input type="checkbox"/>

Are factors contributing to unacceptable conditions outside the control of the manager?

Yes
No

<input checked="" type="checkbox"/>
<input type="checkbox"/>

If yes, what are those factors?

- | | | |
|---|---|--|
| <input type="checkbox"/> Flow regulations | <input type="checkbox"/> Mining activities | <input type="checkbox"/> Upstream channel conditions |
| <input type="checkbox"/> Channelization | <input type="checkbox"/> Road encroachment | <input type="checkbox"/> Oil field water discharge |
| <input type="checkbox"/> Augmented flows | <input checked="" type="checkbox"/> Other (specify) <u>upland house and road construction</u> | |



Picture 1



Picture 2



Picture 3

Remarks

This area of degradation has three major contributing factors; a large log jam, upland clearing for construction, and upland dumping.

There is a large log jam that is causing the enormous amount of sediment to be dropped near the downstream base of the bridge (See Pictures 2 and 3).

The upland to the west has enormous amounts of soft dirt in piles along the cleared hill and road side with nothing to stabilize them in the event of a low or high flow (See Picture 1). The sediment flow seems to enter the creek at two places; there are a series of haystacks on the west side of the creek on the upstream side of the bridge and the downstream west side of the bridge has a concreted bank where the large sediment piles sit directly below (See Pictures 2, 3 and 4).

On the upland east side of the bridge is another area devoid of vegetation where dumping of excess dirt and rocks has occurred (See Picture 5) .

A smaller contributor to the degradation is a bridge with a concreted base and bank sides. Although it is not undercut, the base of the tree directly downstream is severely undercut, contributing more sediment to the system (See Picture 4).

End at N 36,27.521 W 121,43.966 Ele. 589 ft. / Phone pole #36

Checklist Comments

#5, 17 There is a huge excess of sediment in this reach, from the nearby upland construction, and dumping.

#12 There is plenty of LWD, some of which needs to be removed as it is greatly contributing to the enormous sediment drop.

#14 The large pointbars are not revegetating.

#16 The system of the creek is stable, however, the nearby uplands where construction, clearing and dumping have occurred are not vertically stable.



Picture 4



Picture 5