# Kelsey Notch Trail Environmental Compliance Report 2021

Date Reviewed: October 15, 2021

In attendance: Jake DeBow (NHFG-Regional Wildlife Biologist), John Magee (NHFG-Fisheries Habitat Biologist), Clint Savage (NH Trails Bureau-Regional Supervisor), and Maggie Machinist (NH Forests and Lands-Regional Forester)

Overview- The Department of Natural and Cultural Resources is required to submit an environmental compliance report to CORD annually. This report is a requirement of the conditional approval, dated March 29, 2021, for the Kelsey Notch Trail.

#### Recommendations from the 2020 Report

- -Treat the invasive species (Phragmites australis) with herbicide to minimize the spread. Flag those areas so that future road work and trail maintenance does not disturb those areas and spread the Phragmites australis.
- Continue to monitor the amount of washing on the edge of the bridge.
- Continue to monitor and clean out the rubber water diversion devices.

## Worked completed in 2021

#### Trail Counters\*

The trail was open from May 28, 2021 to October 11, 2021. There were 3 trail counters deployed from May 27, 2021 to October 15, 2021. Two of the counters had some malfunction during the season. The one on Corridor C (Figure 1) reported only 375 counts and clearly was not operating correctly. This was due to the counter being moved on August 13<sup>th</sup>, after it was realized it had been tipped over and not working, and not reset properly. The other was on Corridor-C South, near the bridge over the East Branch of Simms Stream, but recorded counts (4,845) only from May 27 to September 11, 2021 at which time the battery failed. The counter on Corridor B worked properly the entire time and reported 12,293 counts. It is expected that this counter would have the most trips due to its location because it is where two trails intersect. As a reference, the trail counters were not deployed in 2020, and only one was deployed in 2019 on Corridor C-South (same location as 2021).

Kelsey Notch Trail - Corridor B: 12,293 trail counts

Date range: 5/28/21 to 10/15/21

Kelsey Notch Trail - Corridor C North: 375 trail counts

Date range: 5/28/21 to 5/29/21 (unit fell off mount and stop recording)

Kelsey Notch Trail – Corridor C South: 4,845 trail counts Date range: 5/28/21 to 9/11/21 (battery died at end date) \*There was a previous report submitted that had different counter information. It was realized after submission that the reported values were the hours the counters had been functioning for the season, not the accurate trail count data. The amended report has the corrected values.

The trail was graded in July as part of annual maintenance. In the 2020 report, there was a note about sediment washing next to a corner of the bridge, this was repaired in 2021.

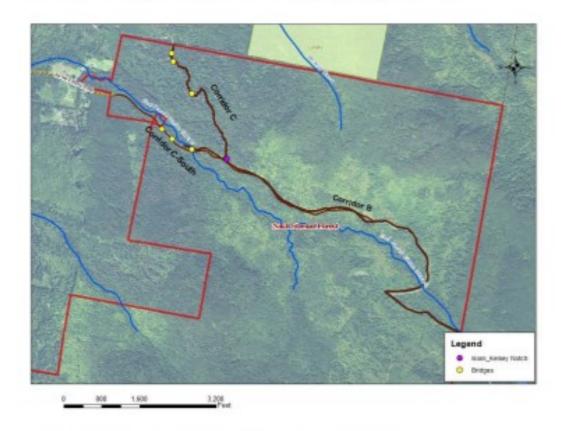


Figure 1- Map of the area showing the location of bridges, kiosk and trails labeled.

### Findings

The trail was visited several times throughout the season both by Forests and Lands staff and by Trails Bureau staff. Forestry staff flagged the Phragmites australis on June 24, 2021 before the July trail maintenance grading and checked the condition of the trail on several dates during the OHRV season.

On October 15, 2021 the Kelsey Notch trail was reviewed by Jake DeBow (NHFG-Regional Wildlife Biologist), John Magee (NHFG- Fisheries Habitat Biologist), Clint Savage (NH Trails Bureau-Regional Supervisor), and Maggie Machinist (NH Forests and Lands-Regional Forester) as the official monitoring trip.

We started by looking at the bridges coming onto the property, as well as the large bridge over the East Branch of Simms Stream (Corridor C-South). All three appeared to be in good condition, and the first two especially since being replaced last year. There was no apparent sediment getting into the brooks that flowed underneath the bridges.

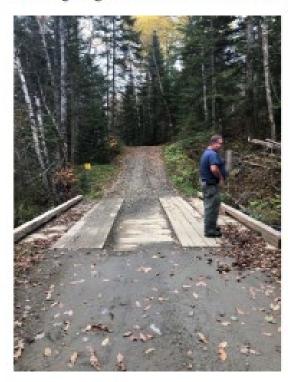




Figure 2- Shows the condition of the bridges

Next, we moved up to the kiosk looking at the hill on the way up. Heading toward Diamond Peaks (Corridor C), we walked out toward the boundary line. This trail was very hard packed. There was minor sedimentation on the trail, meaning there was evidence of sediment that had been washed away from trail but the trail was in good condition. We did not observe evidence of sediment from the trail entering the brooks. All of the bridges had fascia boards added when they were re-decked last year, except one which was noted in the 2020 report. During 2021, the last of the fascia boards were added, and appear to be precluding any sediment from getting into the brooks.



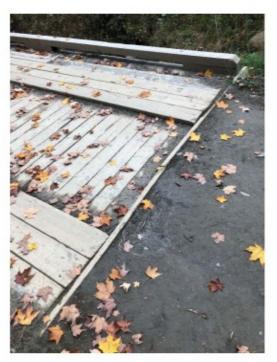


Figure 3- Shows condition of trail and the newly added fascia boards.

Within Nash Stream Forest, near the boundary line on the trail heading toward diamond peaks (Corridor C) there was a mud hole on the trail and there was some ATV's driving in the ditch, but there was no mud getting into the stream (Figure 4).



Figure 4- Mud on trail and ATV tracks in ditch and minor sedimentation on trail from water.



Figure 5- Shows condition of trail

Section 2- Next, we headed up toward Kelsey Notch and the boundary line (Corridor B). This main section had been graded throughout the summer. The trail was in good condition. There

was one location where some sediment was running down the trail and getting into the brook next to the rock/culvert (Figure 6). There was discussion about re-grading the road on that section to grade it away from the stream and culvert.



Figure 6- Depicting the area where the water is eroding around the culvert.



Figure 7 -Shows some off trail riding

Each year, the sharp corner leading up to Kelsey Notch gets a significant berm. This happens from the dirt and rocks getting kicked out as the OHRVs turn and head up the hill, exacerbated with speed.



Figure 8- Shows berm on corner of trail

In 2020, we found a few patches of Phragmites australis. These were located and flagged throughout the year to identify their locations and so they could be avoided by the Metallik ATV club performing maintenance.. These areas were treated on September 3, 2021 with glyphosate by Fish and Game staff who are licensed pesticide applicators.





Figure 9- Shows invasive species, phragmites

#### Recommendations-

- Fix the mud hole near the property line toward Diamond Peaks (Figure 4).
- Place a culvert before the bridge at the end to address the sitting water near the mud hole (Figure 4).
- Fix culvert header where it is washing, and slope the road away from the outlet of the culvert (Figure 6).
- Continue to monitor and clean out the rubber water diversion devices that are in various locations on the trails.
- Continue to monitor and treat the invasive species. It will take many seasons to eradicate the phragmites australis, and should be treated each year during the growing season.

Conclusion- The trail is in good shape though there is some minor erosion and sedimentation. There was some sediment leaving the trail, but most of it was being contained, either naturally in vegetation or in constructed sediment basins, and not entering into the brooks. There were some minor issues that should be addressed in the upcoming year. Fish and Game continues to have concern regarding wildlife impact of ATV noise during high volume trail use days. Three of the four patches of the invasive species were treated in 2021 and all four will be treated in 2022. The trail is currently closed for the season until the spring of 2022, when conditions allow, after May 25.

Margaret	Machinist,	Regional	Forester
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