

# Swimming Upstream: The Challenges of Science Communication and Salmon Habitat Restoration

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## **Background**

- Salmon species are deeply impacted by human created barriers (like pipes and dams (Figure 1)) since they prevent them from traveling upstream which impacts their ability to spawn, to reach cooler waters, and to access food
- Communicating this issue to the public is difficult since the restoration work is often complex
- Effectively communicating the work being done while also making it visually appealing can be challenging
- Conduct research to understand the best methods of science communication through digital media



Figure 1: This picture shows how barriers prevent fish from traveling upstream.

## Internship & Methods

- Interned with Coast Salmon Partnership with their **Communications Outreach Team**
- Conducted a literature review on current research on science communication using digital media (e.g., videos), produced a video that communicated the work being done at a restoration site
- Interviewed project managers, created independent surveys, and organized a photo database

#### Research Questions

How does using visual media and science work to effectively communicate the benefits (or progress with) salmon habitat restoration? What are the key components of science communication that make it the most effective?

#### Results



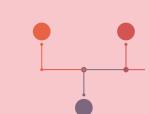
Discovered strong relationships between the use of emotions (e.g., hope and fear) and behavioral decisions. If people feel connected to the work they are more likely to take action



The largest contributor to effective digital media communication is making the work visually appealing



Conveying research relies on simple wording and the avoidance of jargon



Viewers were motivated by visually appealing work and an easy to understand storyline (Figure 2)

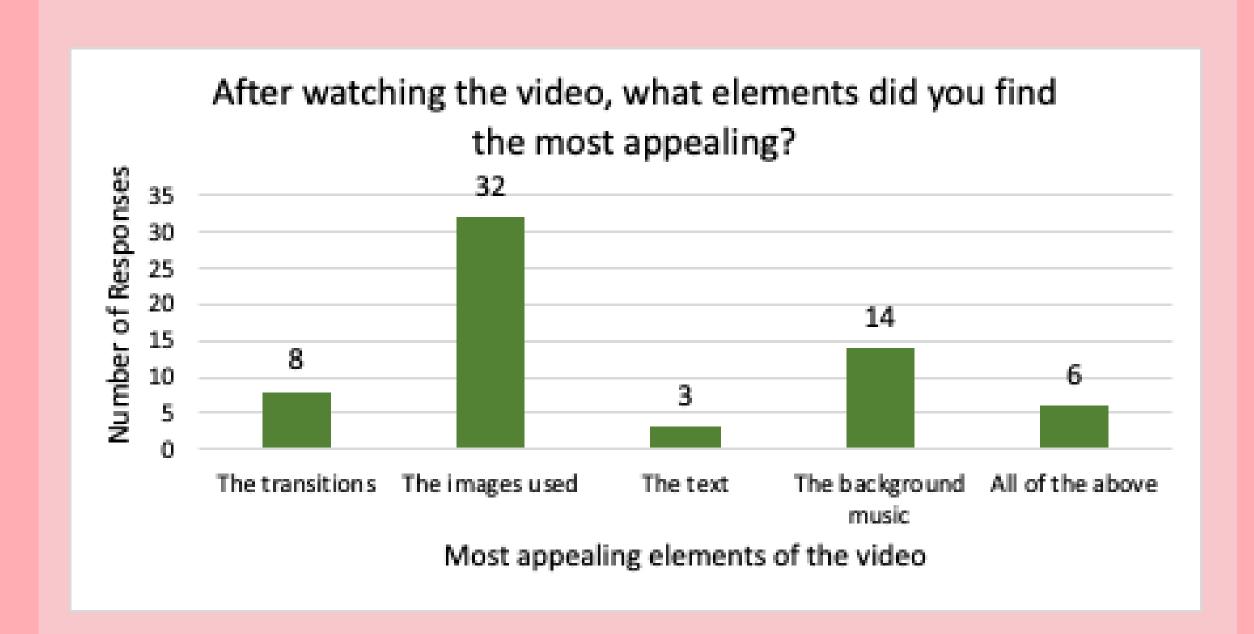


Figure 2: Infographic results show the results to the question "What elements of the video did you find the most appealing?". The percentage is over 100% since respondents were allowed to choose multiple answers.

## **Significance**

- Effectively communicating the importance of this issue is going to be crucial in preserving these pristine habitats (Figure 3)
- If people become more aware of restoration issues, it can influence their behavior to get involved
- Knowing how to communicate scientific data is important in our increasingly digital world

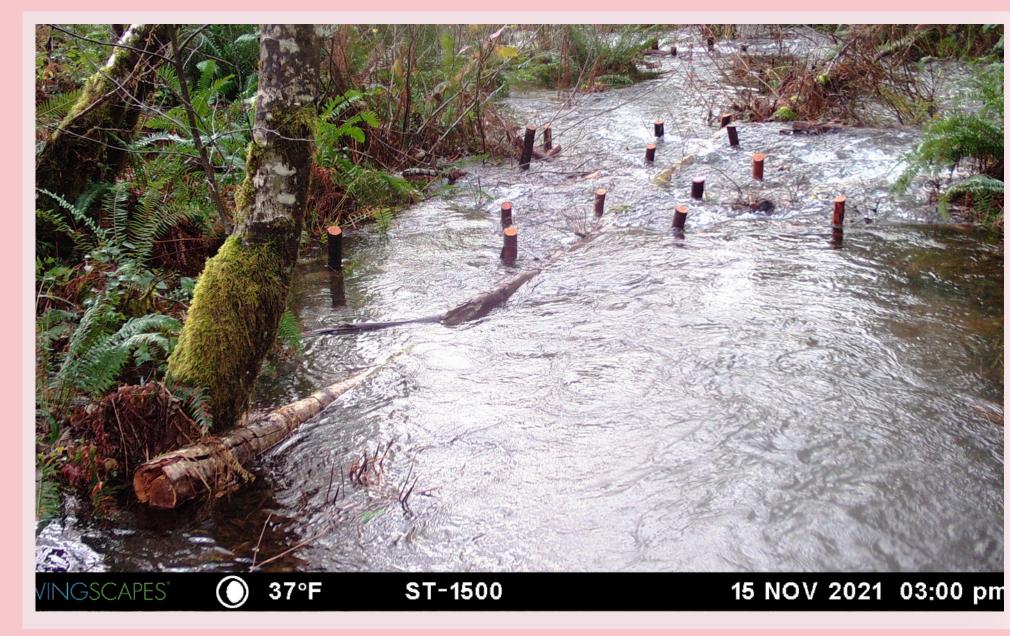


Figure 3: This image represents the healthy habitats that must be protected to preserve species.

## Next Steps

- Continue to implement effective ways of communicating (e.g., avoiding jargon) during outreach programs to bring awareness to habitat restoration issues
- Understand how to connect with your audience to get the bigger picture message across
- Continue research on the importance of science communication through the use of digital media

## <u>Acknowledgements</u>

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