

## Species Reintroduction

### Should Species Reintroduction Be Considered to Solve Environmental Problems?

In this paper, I argue that species reintroduction should be considered to help solve environmental problems. Species reintroduction is the return of species back to their natural habitat. Reintroduction can restore the ecological balance by reversing the effects of environmental damage that were caused by human activities. Thus, the process can restore ecosystems (Guesset, 2012).

I support my position on species reintroduction for the following reasons. First, I argue that species reintroduction can restore the natural food chain. The reintroduction can help many living organisms retain their natural food in their habitat, allowing balance in the ecosystem (Hale & Koprowski, 2018). Second, species reintroduction can prevent the long-term disruption of the ecosystem. Specifically, when species are reintroduced into a particular place, they begin the process of repairing and balancing the ecosystem, leading to the prevention of environmental damage (Ripple & Beschta, 2011). Finally, species reintroduction can repair the damage caused by agricultural and industrial human activities. For instance, the keystone species restoration had a very positive outcome on the environment for those affected areas (Palazón, 2017).

I also take into consideration the opposing side of species reintroduction. First, species reintroduction may cause damage to newly formed environmental links (Derham et al., 2018). Second, The method can cause unpredictable consequences to the environment (Byrne & Pitchford, 2016). Finally, reintroduction can disrupt people's agricultural businesses (Coz & Young, 2020). While these claims have merit, they can be refuted by providing evidence of a study that suggests, for instance, the positive impact of reintroduction in areas where it was implemented (e.g., the keystone species reintroduction). As such, the method is a very low-cost alternative for solving substantial environmental damage that can be very costly using other solutions.

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This paper is important because it highlights the importance of creating a healthy and balanced ecosystem. As such, we can ensure the quality of human lives and reduce many environmental problems that have occurred because of neglect of the environment. Human behavior leads to environmental problems such as climate change and air pollution. Unfortunately, the modern world structure of living promotes these activities. I conclude my paper by suggesting that such problems can be resolved if people participate in active campaigns to raise awareness of such environmental problems and careful observation of relevant environments.

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### Species Reintroduction Can Disrupt the Environment and Businesses

Many critics argue that species reintroduction can cause more harm to the environment than good. Species reintroduction is the return of species back to their natural habitat, and the goal is to restore food chains and ecological balance (Guesset, 2012). First, critics argue that species reintroduction is a controversial method caused by its unexpected political and environmental impacts (Alston et al., 2019; Coz & Young, 2020). Second, species reintroduction may not be ideal in solving ecological problems because of its unpredictable effects on the habitats' general state (Alston et al., 2019). Although some may argue that species reintroduction is a highly controversial method that can damage the environment. However, species reintroduction has shown its viability from its success in many experiments. Thus, it showed that the process effectively restores the ecosystem to its original state and sometimes even better.

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### The Damage to the Newly Forming Environment

Some critics argue that species reintroduction can disrupt the ecological balance of the habitats in which it is used (Alston et al., 2019). For instance, when species are reintroduced in a specific area, they start eating resources that other animals find critical to their existence. When this happens, the animals begin to search for other food alternatives,

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and eventually, the animals can die or start to migrate to other places in search of food and shelter. In addition, the extinction of species in a habitat can result in drastic changes in the area. This extinction of species can eventually lead disruption of more than one species.

As a consequence of the problem of species reintroduction, many species can go extinct, and the ecosystem can be disrupted. Alston et al. (2019) indicate that species reintroduction can lead to devastating consequences to the ecosystem. Instead of improving the ecosystem as a whole, the authors argue that it can lead to a large-scale condition of disorder and chaos by resulting in a significant disturbance to the environment. For instance, the reintroduction of wolves in Yellowstone has coincided with a severe long-term drought that disrupted the area since wolves feed on elk (as cited by Middleton et al., 2013). The consequences of the result can eventually lead to the extinction of species. A newly forming environment is very much likely to have different conditions that have a drastic difference from the previous environment. Thus, the extinction of one species can disrupt many species and organisms in the environment that can be very tragic to the ecosystem.

The problem with the critics' argument is that it assumes that species reintroduction experts do not consider the long-term effect of such actions. However, species reintroduction has beneficial results to the environment since it involves many complex and detailed calculations of the potential species reintroduction impacts. For instance, many large-scale models exist of the tree reintroduction process that allows for a better understanding of the process's possible impacts. Thus, these models will enable experts of species reintroduction to predict potential problems that may be faced while undergoing the process (Gustafson et al., 2018). As such, the issues that occur as a result of this matter are only valid regarding unprofessional methods of species reintroduction.

There are some findings that indicate that careful observation is the most critical part of the process of species reintroduction. According to Lamothe (2019), experts in the field

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always consider the possibilities and consequences of what could happen from various scenarios. Consequently, the author suggests that there are many beneficial outcomes from the process. For instance, before experts reintroduce species to a particular habitat, they must undergo a process of complex calculation to guarantee the safety and success of the process. Therefore, the reintroduction process can create more benefits to the environment, and it takes into consideration the safety of the animals and plants in the area.

## **Disruption of Businesses**

Many people argue that they are against the species reintroduction method since the process could disrupt businesses. According to Coz and Young (2020), the process has political issues as species reintroduction can negatively impact the public perception of favorable environmentalist policies. In addition, that there have been some cases of reintroducing certain species that have led to political conflicts, like the case of species reintroduction of beavers in Scotland. For instance, the authors state that "Conservation conflicts depend not only on environmental and economic but also on social, cultural, and conceptual factors" (p. 408). The authors explain that the local farmers in the area were concerned that the beavers could damage their agricultural businesses and the artificial habitats created by humans. Likewise, several issues indicate that species reintroduction often causes political conflicts. These issues result from local people's fear of the habitats' safety around the area (Watkins, 2021).

The process of species reintroduction threatens people who own local businesses. This threat comes from the potential damage that may affect them. Several studies confirm the negative impact of species reintroduction on local businesses. These studies conduct research on how the process has negatively affected people's businesses. As such, people responded to policy to implement species reintroduction as a threat to their business, resulting in people not supporting the implementation of the process (Coz & Young, 2020).

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The critic's conflict and the evidence provided show how the negative impacts of species reintroduction can devastate the environment's political consequences from such implications. These political issues can cause people to vote for parties that are against the policy of species reintroduction so as to secure their businesses. Such effects can disrupt the pro-environment agenda in any society. Some critics believe that the species reintroduction process can create devastating impacts from a political point of view, even if it is beneficial to the environment.

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Overall, the critics' arguments are focused on cases that are viewed as bad species reintroduction policies. These critics' arguments concentrate on the cases that failed in producing a positive result of species reintroduction. However, some studies contradict the arguments presented by the critics. For instance, one study indicates that the proper species reintroduction method must involve proper message framing. As such, there is always a team dedicated to species reintroduction that highlights the benefits of the process regarding the local population. This method has been shown to be beneficial for the environment (Niemiec, 2020). Furthermore, Watkins et al. (2021) indicate that the maintenance of positive assurance politics often works. Therefore, the arguments presented show how the critic's problem has a solution that could solve such issues regarding the process.

## The Unexpected Behavior of the Species Reintroduction Process

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### Benefits of Species Reintroduction

Some critics argue that species reintroduction is viewed as a highly controversial process. This is a result of some unprofessional attempts at performing this process. However, species reintroduction should be considered to help solve environmental problems because it can help restore the natural food chains, prevent the long-term disruption of the ecosystems, and repair the damage caused by agricultural and industrial human activities (Hale &

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Koprowski, 2018; Sheikholeslami et al., 2020; Robinson et al., 2019). Overall, species reintroduction is a process that has a tremendous positive impact on the environment. This process allows for a balanced ecosystem for living organisms.

## **Restoration of the Natural Food Chain**

Species reintroduction can positively impact natural food chains (Hale & Koprowski, 2018). The reintroduction process can restore and stabilize the ecosystem. Once the ecosystem is balanced, it reconditions the natural food chain and creates more functional habitats for species. There are many examples of successful species reintroduction cases that result in positive outcomes. According to Hale and Koprowski (2018), their comprehensive range review of the species reintroduction process positively benefits the environments. The process of species reintroduction help restores the ecosystem in certain regions of implementation.

The process of species reintroduction results in stabilizing the ecosystem condition. As discussed in Palázon (2017), the restoration of brown bears in the Pyrenees has resulted in tremendous success since it started to disrupt minor predators that are more aggressive. These minor predators compromise the food balance in the entire ecosystem. In addition, the reintroduction of bears prevented the gradual decline of the species that are reliant on a particular plant or animal, since they can regulate the ecosystem through prey control. Therefore, species reintroduction can create a tremendous healing chain reaction to the ecosystem, resulting in the gradual restoration of the entire ecosystem to its former original state of proper balance.

-In this regard, many examples demonstrate how species reintroduction is beneficial and produce a positive outcome in the areas where it was implemented. For instance, the reintroduction of Hill's thistle to its natural habitat resulted in positive impacts in the area.

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Hill's thistle acted as a powerful resource of food for other species of animals. This plant prevented the disruption of animals reliant on it (Sheikholeslami et al., 2018).

Other cases of species' reintroduction prove that the process have a high success rate. Lamothe et al. (2019) indicate a case of success of the species reintroduction process in water streams. In particular, the process of species reintroduction is complex and requires constant observation, which eventually led to an improved state of the water stream environment. Therefore, creating a thriving environment for many species and a properly balanced food chain. That, in turn, helps restore the ecosystem.

Overall, there is much evidence suggesting that the process of species reintroduction effectively restores the food chain in the ecosystem. Therefore, when there is an invasive utilization of species reintroduction in a specific area, the more likely the process restores the food chain in the ecosystem, resulting in a tremendous improvement of the food chain. These improvements prevent the destruction of the ecological system in a particular region and ensure long-term existence. [this paragraph needs more explanation]

## Prevent the Long-Term Disruption of the Ecosystems

Species reintroduction can impact the ecosystem positively in many ways. One of the impacts it creates is preventing the long-term disruption of the ecosystem by restoring species that form the crux of food chains (Hale & Koprowski, 2018). One of the devastating impacts of species dying out is the massive destabilization that is caused by overexploitation. Unfortunately, the disruption of food often leads to the collapse of the ecosystem that can affect many species, killing a large number of animals and plants. To illustrate, the extermination of the wolves in Yellowstone park resulted in a massive proliferation of coyotes. Coyotes were much more aggressive than the preceding apex predators and created an imbalance in the area (Alston et al., 2019; Ripple & Beschta, 2012). Accordingly, the problem of species dying out lies in the possibility of a chain reaction that could affect

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dozens if not hundreds of species. Thus, species reintroduction can solve many issues regarding the overexploiting of species in the area where it was affected.

Current data suggest that the rapid investments in species reintroduction can easily counterbalance species' overexploitation. The reintroduction of species in the affected areas can eventually lead to the prevention of the long-term disruption of the ecosystem. For instance, species reintroduction has a great advantage to the ecosystem by stabilizing it. According to Hale and Koprowski (2018), they indicate that beaver reintroduction has resulted in the resumption of "Several keystone functions, such as influencing hydrological processes and space use of bats" (p. 447). The reintroduction of wolves can decrease the population of coyotes in the area and the subsequent increase of the non-predatory species (Alston et al., 2019).

Another study indicates that species reintroduction is a process that typically results in a short-term destabilization but ultimately results in the beneficial improvement of the ecosystem (Alston et al., 2019). As such, the studies provided indicate clearly how species reintroduction has a great significant impact on the ecosystem in the long term. Not only do people who support the method of species reintroduction agree that it can prevent long-term disruption of the ecosystem, but also some critics agree that species reintroduction of endangered species can eventually result in reintegrating the ecosystem, significantly improving their overall level of stability. [incomplete paragraph, TO BE COMPLETED in the final draft]

## Repair the Damage Caused by Human Activities

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## Conclusion

~~To summarize,~~ This paper aims to show that species reintroduction should be supported and actively promoted since it provides a significant impact on the ecosystem in terms of stabilizing and restoring the environment. There is much evidence that suggests that

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the process of species reintroduction is beneficial to the ecosystem because species reintroduction can restore the natural food chain balance, prevent the long-term disruption of the ecosystem, and repair the damage caused by agricultural and industrial human activities. On the other hand, some critics are skeptical about the process of reintroduction for the following reasons. First, species reintroduction can damage the environment because of its unpredictable behavior. Second, it can create harmful damage to the latest forming environmental habitat. Finally, it can disrupt people's agricultural business, leading to social conflict. There are some arguments that the critics present that are worth considering since some methods may affect the progression of species reintroduction in upcoming projects. However, there are many ways to solve the problem presented by some critics. One of the most significant ways that produce a positive outcome with regards to the process is by having experts and professionals in species reintroduction monitor and observe the environments where the process was implemented. That way, the process will guarantee to be effective, and it will solve many environmental problems that are faced today.

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And considering it is a working draft .... AMAZING!

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