

Data Submitted (UTC 11): 12/8/2020 8:00:00 AM

First name: Brett

Last name: Glover

Organization:

Title:

Comments: Concern

Noxious weeds,

It's long been known that noxious weeds are opportunistic and will rapidly invade disturbed areas. The Forest is proposing treating up to 100,000 acres annually, which might take the form of burning or mechanical. The document says noxious weed infestations will be treated before being burned. However, a problem with this is that established infestations will have an established seed bank. Many of the weed species that occur on the Forest have seeds that will remain viable for many years. For the weed species whose seeds are dispersed by wind, you will find a new infestation will develop after a fire, downwind of the primary infestation. Even though a weed treatment may occur before the project takes place, noxious weeds are competitive and will invade and dominate the site. For these projects to be successful, a long-term restoration plan needs to be developed.

Annual grasses. The proposed action will result in a massive increase in annual grasses, which will explode under a burning program as described. The Forest currently has examples of annual grasses expanding into either the prescribed burns or mastication projects that have occurred. The Bridgeport RD has problems with cheatgrass establishing at the slash pile burn sites. The Forest has already demonstrated that treatment in many of these sites leads to an increase in annual grasses. Even when the sites are treated for control of the annual grasses many of these sites have converted to Russian thistle dominated sites. Again, this is due to a lack of a restoration plan and a good understanding of the ecology and soils that are more prone to invasion by annual grasses.

In a broad sense, the Ely and the north half of the Ruby Mtn RD's have limestone parent soil material, which helps slow the establishment of annual grasses. This is in comparison to Bridgeport, Carson, Santa Rosa, Mtn City and Jarbidge RD's, which all have soils derived from parent material that is more conducive for annual grass establishment. Essentially, any treatment on large portions of these ranger districts will result in converting them to annual grassland, leading to the associated crash of the native ecosystem.

Since the Forest does not have approval for aerial application of herbicides, any treatment will be limited by vehicle constraints given the topography of the site. There are other options - like controlled or targeted grazing which have some success with managing annual grasses. But if these practices are not carried out properly, such as with the wrong class of livestock or poorly timed, this can lead to damaging perennial grasses or soil damage if carried out too early -- ultimately leading to annual grass invasion. These proposed projects rely on various district personnel to provide input for these projects and to provide monitoring -- this will just increase the workload for an already overextended workforce. The document mentions that monitoring will occur on these projects to gauge the results but the Forest has not demonstrated an ability to adequately monitor other projects that have been undertaken and there is no reason to think that these projects will be any different.

In general, this document needs to provide more guidelines and direction. For invasive species, a restoration plan has to be part of the project proposal -- particularly as this proposal is going to affect vast areas and could potentially alter many ecosystems if not carried out properly.

This document should provide more guidance for sagebrush communities that should not be treated, such as low sage, Wyoming big sagebrush, and Mountain sagebrush at its lower elevational range. There needs to be some soil depth and productivity measures to ensure these communities will reestablish. There also needs to be some direction on what native undesirable species, like curl leaf rabbitbrush, will establish and expand after treatment.

The same consideration also needs to apply to treatments in P/J communities. Areas that have shallow soils should not be burned and treatment should be limited to cutting trees down.

This document does not address or take into consideration what effects climate change will have on the vegetative communities that are to be treated. Many of these communities were established under wetter and cooler weather regimes. Expecting the same community to come back in many cases is unrealistic. The Forest has not attempted to say what a given treated area might come back as, if it will be desirable or not, or even if it will push the area to a more desirable condition.

With the effects of global warming, it's unclear how many of these sites will respond to treatment.

This document is trying to address various project proposals for a wide range of ecological communities and habitat types. It has the potential for having a significant effect if the project is implemented as currently designed. This project should be addressed in an EIS and not an EA. The potential for type converting large areas to annual grassland or noxious weeds is too great.

In addition, with the effects of climate change affecting all native systems, the Forest needs to show it has a good handle on what a treatment site will come back as. In addition, in both cases, what effects these projects might have on the associated trophic levels.

The following recommendations are for specific Design Elements:

Page 14 ID 24:

This DE is too general; the likelihood of permanent type conversion is too great as described. Numerous publications rate different factors as they relate to resilience to invasion. Dr. Jenny Chambers has published several articles specific to the Great Basin. The two examples below were developed for the eastern portion of the forest.

If fire is going to be used for the control of annual grasses or noxious weeds in general, a restoration plan needs to be part of the project plan. Seed viability for most annual grasses are short compared to broad leaf weeds, so the likelihood of seeing restoration success in a short time span is high.

This document also needs to quantify the amount of noxious weeds that - if present - will disqualify an area from being burned, or place design criteria into the burn plan so these areas are not burned. [See Letter for Figure of Resistance and resilience to cheatgrass]

Page 14 ID 34 and 36:

34 ID; should be combined with ID 24. Burning on areas as described would be good management guidelines if it were not for invasive plants. These are the exact site descriptions that have a very high probability of converting to annual grass.

ID 38; This design feature needs more guidance. The Forest has been doing this for a while and it should make a point to identify the types of soils types that are coming back to annual grasses and what sites are not having this problem. Again, this is giving more guidance to the districts for the best possible outcome.

Page 20 ID 44; All drafting equipment should be cleaned for aquatic invasive species.

A Design Element should be added that addresses what sagebrush communities should not be treated, such as low sage, Wyoming big sage and the lower elevations extent of the Mountain big sagebrush stands.

A Design Element should also be added for restricting burns in areas that have native undesirable species that increase after fire, for example, *Chrysothamnus viscidiflorus*.

A Design Element should be developed with the realization that much of the aspen stands in Austin/Tonopah, Ely, Ruby, Jarbidge and Mountain City RD[squo]s have a problem with the elk numbers that are present. Many of these stands will need fairly substantial fences to keep the elk out.

The following table is old but it does show what vegetative types are more prone to noxious weed invasion. Data like this should be provides in your Design Elements to help provide more guidance as to what areas will be prone to invasion by noxious weeds.

[See comment for figure of weed frequency on all vegetation types]

Numerous regulations and executive orders address the agencies responsibility for analyzing the effects of noxious weeds. Most of which are not followed. When I worked for the Forest Service, it had managers showed a laxity towards noxious weeds and annual grasses. It has to be apprehended many of these species they will dominate sites to the near elimination of the native systems and all they support.

I realize the need for bring burning or some type of disturbance back into the landscape but it needs to be done in a thoughtful and deliberate manner. I am not sure that would occur with what is being proposed judging by some of the results of the current projects.

FSM 2901.01 - Laws

The principal statutes governing or supporting the management of aquatic and terrestrial invasive species on the National Forest System include but are not limited to, the following statutes. Except where specifically stated, these statutes apply to the entire National Forest System.

The Federal Noxious Weed Act of 1974, as amended (7 U.S.C. 2801 et seq.), requires cooperation with State, local, and other Federal agencies in the application and enforcement of all laws and regulations relating to management and control of noxious weeds. The Federal Noxious Weed Act directs the Secretary of Agriculture to:

- a. Develop and coordinate a management program for control of undesirable plants which are noxious, harmful, injurious, poisonous, or toxic on Federal lands under the agency's jurisdiction,
- b. Establish and adequately fund the program,
- c. Complete and implement cooperative agreements and/or memorandums of understanding regarding the management of noxious weeds on Federal lands under the agency's jurisdiction, and
- d. Establish Integrated Weed Management to control or contain species identified and targeted under cooperative agreements and/or memorandums.

2901.03 - Executive Orders

1. Executive Order 13112 issued February 3, 1999 (E.O. 13112). Directs Federal agencies to: (1) identify actions that may affect status of an invasive species; (2)(a) prevent introduction of such species; (b) detect and control such species; (c) monitor population of such species; (d) provide for restoration of native species; (e) conduct research on invasive species and develop technologies to prevent introduction of such species; (f) promote public education of such species; and (3) not authorize, fund, or carry out actions likely to cause the introduction or spread of invasive species in the United States or elsewhere unless the benefits of the action clearly outweigh the harm and the agencies take steps to minimize the harm.

R4 FSM 2081.2 - Prevention and Control Measures

1. Recommended Practices. Stop the spread of existing noxious weeds and prevent invasion of new sites or new noxious weeds by applying prevention and control mitigation measures where applicable and appropriate. Potential practices to consider:

a. Project Design and NEPA. Incorporate noxious weed prevention into all project layout, design, and alternative evaluation.

Environmental analyses should consider noxious weed risk in evaluating project location and design, and in the development of alternatives and mitigating measures, including any or all of the following, as determined to be appropriate by the Forest Officer in charge:

- (1) The presence of existing noxious weeds within the project site by species and magnitude.
- (2) The susceptibility of the habitat type to noxious weed invasion.
- (3) The risk for invasion or spread of noxious weeds that could be caused by the project.
- (4) The evaluation of alternative sites, which are noxious weed-free and/or low risk, for project implementation.
- (5) The evaluation of alternative implementation methods where they exist, which would reduce risk of invasion or spread of noxious weeds.
- (6) The inclusion of other mitigation measures (practices) designed to minimize risk of invasion or spread of noxious weeds.
- (7) The evaluation of direct, indirect, and cumulative effects of the project to noxious weed species and populations.

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