

SEASONAL FIRES AND THE DESTRUCTION OF FORESTS IN SOUTHWEST PRIMORYE



Seemingly harmless ground fires are slowly destroying habitat of the Amur leopard, without which this rare cat will not survive.

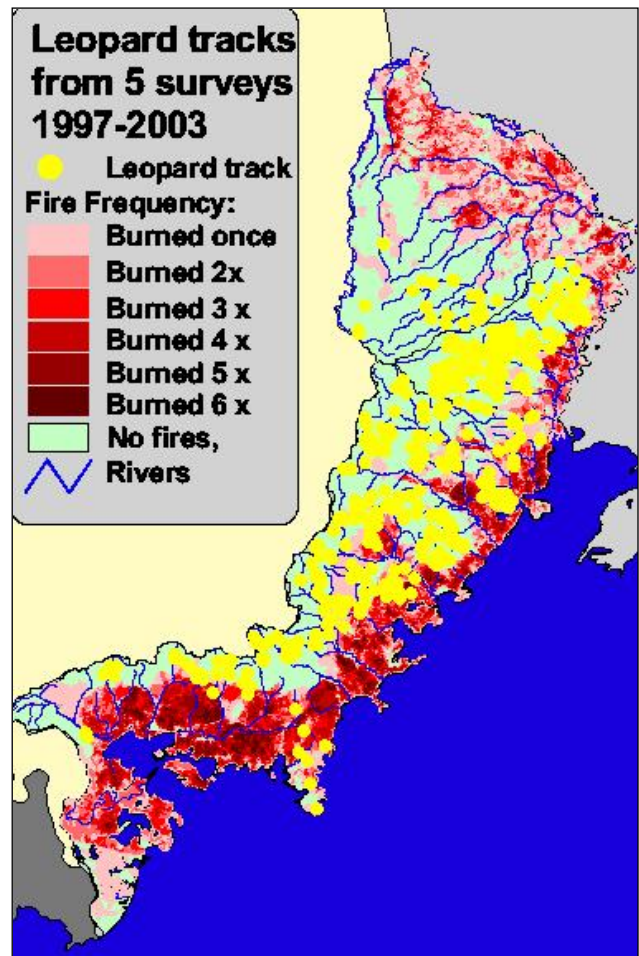


THE PROBLEM

Primorsky Krai in the Russian Far East is one of the most biologically rich, temperate forest zones in the world. Its forest resources represent a key element of a sustainable economy for the region.

However, recurrent human-caused ground fires are slowly destroying forest habitat. Nowhere is this more evident than in Southwest Primorye, where satellite monitoring indicates that approximately 50% of the land base burns at least once every 10 years. Recurrent fires over the past century have converted what should be a luxuriant forest of mixed coniferous and deciduous trees, into semi-permanent grasslands. Today, only 57% of Southwest Primorye remains forested.

These fires destroy habitat for highly endangered species such as Amur tigers and Far Eastern leopards and have negative impacts on human health and welfare. All over Russia, such fires are increasingly recognized as an important source of carbon emissions contributing to global warming and melting of the Arctic permafrost ice.



Leopards (records of their tracks marked as yellow dots) clearly avoid areas that have burned (in red).



WCS RESPONSE

Wildlife Conservation Society's (WCS) collaborative Fire Management Program represents an attempt to coordinate NGOs, regional and local governments, and protected areas in developing a comprehensive response to seasonal ground fires. With funding from the United States Forest Service and in collaboration with local partners on the ground, our program seeks to:



1. Increase effectiveness of fire-fighting through creation of well-equipped and well trained fire fighting brigades;
2. Create a system of firebreaks to halt the spread of fires;
3. Increase commitment to fire prevention by the local government through collaborative agreements;
4. Appoint local fire wardens in communities to control burning of fields and dachas (garden plots);
5. Increase public and governmental awareness of the problem at the local and regional level;
6. Through social research, identify strategies for behavioral change in local people to halt human-caused ignitions;
7. Develop effective and accurate monitoring systems to document both failures and successes.
8. Develop a manual describing fire management approaches that have proven effective in our model areas and lobby local and federal authorities to adopt these 'best practices'.

RESULTS

Early results suggest progress is being made:

- A fire brigade has been created through a cooperative agreement between Slavyanka Municipality and WCS.
- A second brigade has been created to work further north in the Leopardovyi Zakaznik;
- A firebreak system with a total length of 70 kilometers has been developed and maintained in Slavyanka Municipality;
- Over 40 students from PKSAA have assisted in the creation of firebreaks;
- Five fire wardens in small settlements in Slavyanka Municipality educate villagers about fire safety regulations, report fires to the fire-fighting teams and assist police in collecting the evidence needed for prosecution of people who have started fires illegally;
- Social surveys indicate increasing concern about fires in the locality;
- In 2011 we reduced the area burned in our 280 km² model area in Slavyanka Municipality by 99%.



Slavyanka North team fire brigade



Amur leopard caught on camera trap

For further information, please contact Dale Miquelle, Wildlife Conservation Society, Russia. Email: dmiquelle@wcs.org www.wcsrussia.org



With support from our partners:-

