

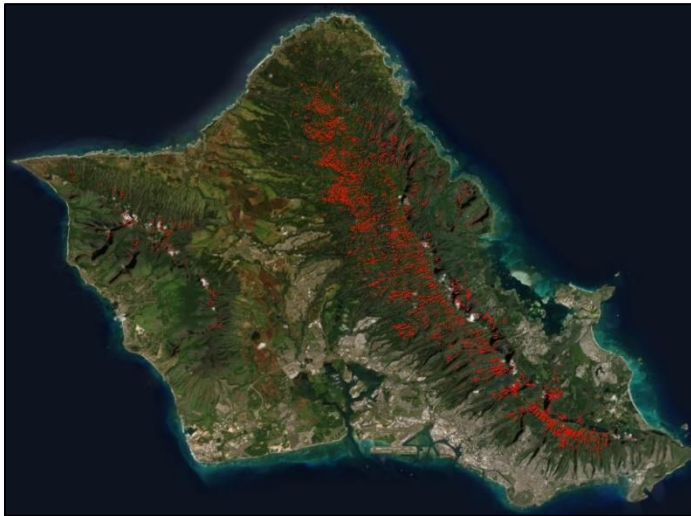


HAWAIIVIEW 2021 - 2022

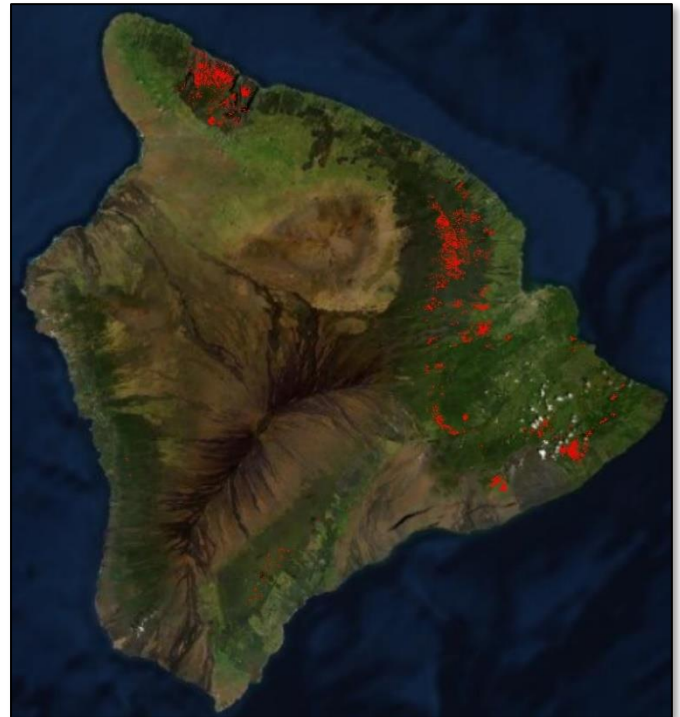
AmericaViewSM
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HAWAIIVIEW 2021 - 2022 ACTIVITIES

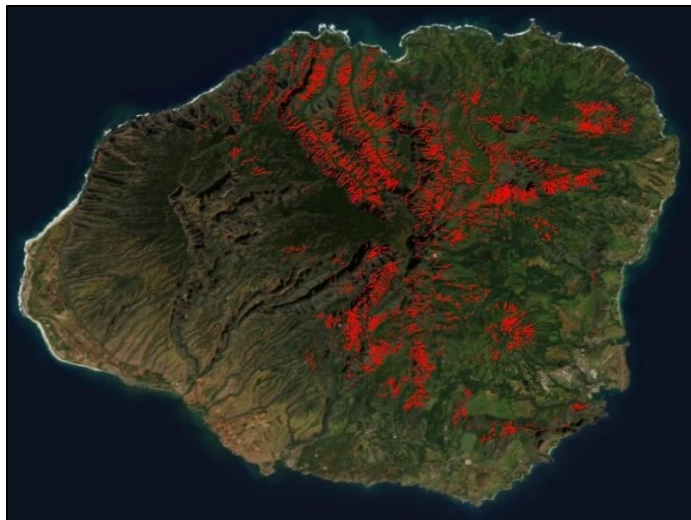
Our main HIA is to map Uluhe for the island of Lanai by collaborating with scientists from USGS Pacific Island Ecosystems Research Center and Pulama Lanai to develop reference datasets and using Landsat-8 cloud-free mosaics generated from GY19. We compared our Landsat-8 based classification with the one from WorldView-2. We further produced the first-ever statewide map of Uluhe by applying the Landsat-8 based model developed from Lanai to other islands.



Uluhe in Honolulu County (Oahu island)



Uluhe in Hawaii County (Big Island)



Uluhe in Kauai County (Kauai island)



Uluhe in Maui County (Maui, Molokai, Lanai, etc. islands.)

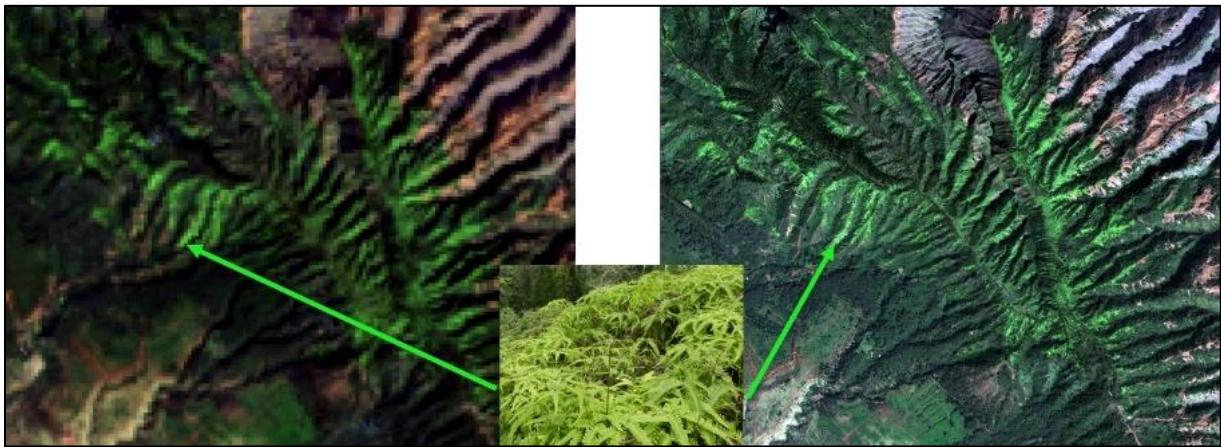
HawaiiView is a member of the AmericaView Consortium, a nationally coordinated network of academic, agency, non-profit, and industry partners and cooperators that share the vision of promoting and supporting the use of remote sensing data and technology within each state. AmericaView is funded by USGS grant agreement G18AP00077.

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BENEFITS TO HAWAIIVIEW

- Uluhe (*Dicranopteris linearis*) is a fern species that plays key roles in conserving Hawaii's ecosystems by 1) preventing invasive weeds from rapid establishment and promoting the growth of native trees such as 'ōhi'a lehua (*Metrosideros polymorpha*), 2) stabilizing the soils in areas of steep slope and high rainfall, and 3) providing critical habitat for endemic animals such as the Hawaiian petrel, a federally listed endangered bird species. In recent decades, Uluhe has experienced dieback or retreat from stressors such as introduced insect feeding and plant invasion. It is critical to develop effective methods to map its spatial distribution and monitor the changes.
- With the Landsat-8 cloud-free mosaics generated from GY19, we produced the first-ever statewide map (<https://hawaiiview.org/data/uluhe18/>) of Uluhe.
- One master graduate student was trained and supported for mapping Uluhe using remotely sensed imagery.



Uluhe's monotypic cover and vibrant green color stands out in Landsat-8 (Left) and WorldView (Right)

HAWAIIVIEW CONSORTIUM MEMBERSHIP



Federal consortium members identified above do not receive funding from AmericaView.

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