MeadoWatch Times

MeadoWatch – a citizen science program to study the impacts of climate change on wildflower phenology at Mt. Rainier National Park April 2017

Thank you for a wonderful fourth year!

MeadoWatch by the Numbers

100+ volunteers

194 hikes

1164 total hours hiked

65% of volunteers hiked with friends or family

77% of volunteers are return volunteers

60% of volunteers talked to family, friends or hikers about MeadoWatch

For your information...

Glacier Basin

2016 was the 2nd year for the Glacier Basin hike. Prefer a quieter hike with less people? This trail is for you!

Sharptooth Angelica

We are now monitoring Sharptooth Angelica instead of Canby's Lovage.

Facebook

Do you use Facebook? So do we! Check out the MeadoWatch Page.

2017 Orientations

Check your email or our website for details on registering for an orientation (mandatory for 2017 participation)

We need your help!

We are fund raising to support MeadoWatch in the 2018 flowering season! Stay tuned for more details on how you can help us keep MeadoWatch going for another year.

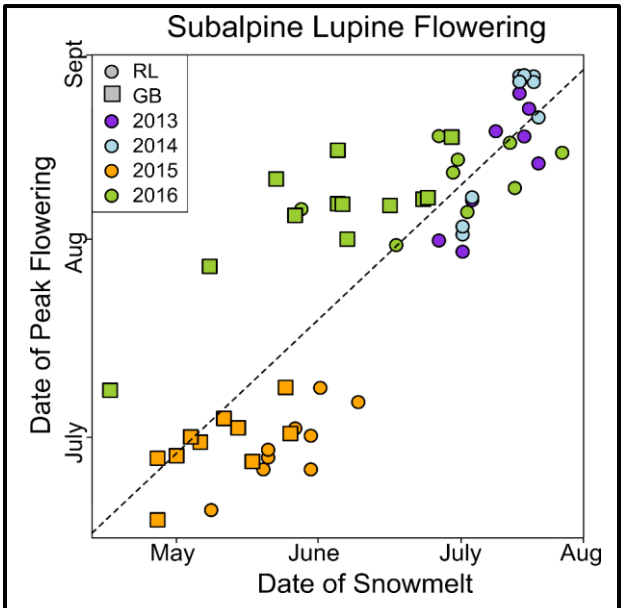
Your participation in 2016 helped make this one of our most successful years yet! The majority of 2016 volunteers had hiked with us before, but we also welcomed many new volunteers. Most of you hiked with family and / or friends, and talked to Park visitors about your work with MeadoWatch (see by the numbers box to the left). Several of you volunteered to help with data entry this winter; a hearty thank you to those who did. All of this has helped us expand the MeadoWatch community!

Mt. Rainier vista on the Glacier Basin Trail

We continue to learn about wildflower phenology from the data you helped collect. For example, we had a warmer than average early spring, causing an early snowmelt in 2016 (but not as early as the record-breaking 2015 melt!). However, because early summer temperatures were cooler than average, the delay between snowmelt and flowering was longer than we expected. You can see this from our four years of subalpine lupine data (graph below). We are therefore exploring the role of growing season temperature and snowmelt in controlling wildflower phenology. We are also just starting to explore the lag between flowering and fruiting for MeadoWatch species.

Notable events this year: Elli Theobald (program design coordinator) received her PhD in June of 2016! Members of the Doris Duke Conservation Scholars Program visited MeadoWatch in July 2016. We have highlighted the MeadoWatch program in several talks, and MeadoWatch data will be featured in a *Park Science* publication later this year.

Although there is still 128 inches of snow on the ground at Paradise, the summer wildflower season will be here before we know it! We look forward to seeing familiar faces (as well as some new ones) at orientation and out on the trails amongst the flowers! Thanks again for your valuable contribution.



Each square / circle in this graph represents the date of snowmelt (x-axis) and date of peak flowering (y-axis) for one plot in one year where subalpine lupine is present. The later that snowmelt occurs, the later in the season flowering occurs. The lag between snowmelt and flowering was longer in 2016 (green squares / circles are higher above the line), likely because cool temperatures delayed flowering.