

SAVE OUR STREAMS

IZAAK WALTON LEAGUE OF AMERICA

ANNUAL REPORT
2020



CONTENTS

Welcome...	1
Clean Water Program...	2
Clean Water Webinar Series...	3
Advocacy Guide...	4
Winter Salt Watch...	5
Clean Water Hub...	9
Save Our Streams...	10
Iowa Save Our Streams...	11
Virginia Save Our Streams...	12
Chesapeake Monitoring Cooperative...	13
Creek Critters...	14
Our Valued Volunteers...	15
Get Involved...	16

Staff

Clean Water Program Director – Samantha Briggs
Chesapeake Monitoring Cooperative Coordinator – Emily Bialowas
Save Our Streams Coordinator, Midwest – Zach Moss
Chesapeake Conservation Corps = Yanoua Kone

Photo Credits

Cover: Torina Stark
Interior: welcome, des moines, Chelsea Larson, Lois Green-Sligo Chapter, Patricia Brokaw,
Sherry Evasic, Sara Jordan, Stacey Heflin, John Feldenzer, Torina Stark, Ken Schaub



WELCOME

Hello monitors, lkes, and friends,

When 2020 began, we (the Izaak Walton League Clean Water Program) were anticipating a very different year...one that was filled to the brim with trainings, meetings, outreach events, and unprecedented growth. Unfortunately, with the COVID-19 Pandemic, the hand we were dealt greatly altered those plans. Over 20 trainings were cancelled (just in the spring!), we worked from home, and we did everything we could to ensure our monitors and staff remained healthy.

It wasn't all bad, though. 2020 was certainly unprecedented, but we were able to grow in different ways. We wrote a new *Save Our Streams Advocacy Guide* so that our engaged monitors would have a resource to reference when they want to advocate for better water quality practices in their region. Salt Watch saw the most engagement to date, with Salt Watchers all over the country monitoring in a safe, socially distant way. We even launched a Clean Water Webinar series that we are carrying with us into 2021. Read on to learn more about these accomplishments.

We are hoping that 2021 brings more training and face-to-face time with our monitors, but looking back on 2020, the drive and perseverance of YOU (our esteemed volunteers), is what we can truly hang our hats on moving into this next monitoring season. Thank you, as always, for your dedication to clean water.



Photo Credit: John Kelly, *The Washington Post*

A handwritten signature in black ink, appearing to read 'Samantha Briggs'.

SAMANTHA BRIGGS

Clean Water Program Director

CLEAN WATER PROGRAM

Samantha Briggs, Clean Water Program Director

The Izaak Walton League, founded in 1922, has a mission to conserve, restore, and promote the sustainable use and enjoyment of our natural resources, including soil, air, woods, waters, and wildlife. The League is a member-based organization composed of 200 chapters across the United States, as well as a staffed national headquarters in Gaithersburg, Maryland.

2020 certainly brought its fair share of challenges, but the core principles remained the same for Save Our Streams – to improve water quality and engage volunteers in water quality issues. We were able to do just that through the following programs:

- Winter Salt Watch
- Save Our Streams Chemical and Biological Monitoring
- Virginia Save Our Streams Biological Monitoring
- Chesapeake Monitoring Cooperative Biological Monitoring
- Creek Critters Mobile Application

Read on to learn more about the activities and successes our Clean Water Program has undertaken and experienced in 2020.



CLEAN WATER WEBINAR SERIES







Shortly after stay-at-home orders were implemented in March of 2020, the Clean Water Program team knew we wanted to keep engaging people in water quality issues, even if we could not be training in person. Thus, the Clean Water Webinar Series was born!

Webinar speakers are either League staff or guest speakers (experts in the field and partner organizations), and topics have ranged from Salt Watch and chloride pollution, to groundwater, nitrates, drinking water, restoration, and so much more!

In 2020, staff held **18 webinars** of an hour or longer, and had **over 1700 attendees!** Those watching including existing League members and volunteers, but we also expanded our audience to include many new people unfamiliar with the League.

To view our archive of webinars, visit:

www.iwla.org/water/webinars-from-the-experts

13		Planting to Protect Your City's Water Izaak Walton League 1:02:10
14		Monitoring Trash and Engaging Communities in the Anacostia Izaak Walton League 1:06:55
15		From the Stream to the Tap: Where Stream Health and Drinking Water Meet Izaak Walton League 1:05:48
16		Mobilizing Congregations for Clean Water Izaak Walton League 56:44
17		Salt Watch Kickoff: How Salt Impacts the Environment and What You Can Do About It Izaak Walton League WATCHED 1:08:00
18		Out of Sight, Out of Mind: The Hidden Reality of Groundwater as a Drinking Water Source Izaak Walton League 58:12



ADVOCACY GUIDE

Over the past several years, the IWLA Clean Water Program has been training and equipping volunteers all over the country, who have been diagnosing impaired streams left and right. This left our monitors with the desire to take the next step to improve the streams they love.

With a break from most Save Our Streams training in 2020, Clean Water Program staff opted to write the Save Our Streams Advocacy Guide, which introduces anyone (even non-monitors) to advocating for their local streams.

Make sure to read through the guide for information and case studies about how to produce change at the local, state, and federal level!

Download the guide here:

<https://www.iwla.org/water/resources-for-monitors>



WINTER SALT WATCH

Last winter we wrapped up a successful season of salt watch (our 3rd season), but we had no idea what was in store for the season this winter! With more people home, and more folks looking for a way to monitor at a distance or do an easy project outside with their kids, Salt Watch has exploded!

Yan Kone, our Chesapeake Conservation Corps Member for the year, took Salt Watch under his wing, and was not only monitoring weekly himself, he was also making and sending out Salt Watch kits, downloading and tracking down Salt Watch data, and mapping that data on a weekly basis.

In 2020, with more Salt Watchers than ever, we wanted to equip them with the tools they need to do more with their data and incite real change. At www.iwla.org/saltwatch in the "what you can do" section, you'll find **state specific letters to the editor of news sources, letters to representatives, and fact sheets** to distribute across the country.



Dear Representative/Senator [your rep's name],

Every winter, snowy weather creates dangerous conditions on our roads. Since the 1940s, communities across the U.S. have been spreading road salt on streets, sidewalks and parking lots to melt ice and create safer traveling conditions. Road salt is effective when used correctly, but we have fallen into a pattern of over-applying and misusing road salt in ways that have damaging side effects on wildlife, human health and the environment. I am asking that you work towards salt reduction in [the name of your community/state].

Road salt inevitably ends up in our streams, rivers and lakes. USGS monitored 30 streams from 1960-2011 in Wisconsin, Illinois, Colorado, Michigan, Ohio, Pennsylvania, Maryland, Texas and the District of Columbia and found that 84 percent of those streams experienced high chloride concentrations due to road salt. And once road salt enters bodies of water, it is extremely difficult and expensive to remove; it's simply not feasible to filter it out at water treatment plants.

Road salt threatens our water quality in multiple ways, by contaminating drinking water, corroding pipes and leaching metals into our water. High levels of chloride are dangerous to human health, especially for people with pre-existing conditions such as high blood pressure. Chloride is also toxic to aquatic life and can degrade vegetation and soil. All told, our current road salt practices cost the U.S. \$16-19 billion a year in damages.

It's possible to reduce salt usage without endangering travelers; some communities are already doing it. Minnesota, for example, has substantially reduced salt usage without seeing any loss of safety on the roads. They've accomplished this through strategies including training salt applicators in smarter salting practices, offering a smart-salting certification to professional applicators and private property owners, drafting model contracts between applicators and owners (<https://www.pca.state.mn.us/water/smart-salting-training>), and requiring applicators and manufacturers to properly store salt supplies.

[Your community/state] can take these steps too. By supporting smarter salting practices, you will be protecting water quality for generations of [Marylanders/Floridians/etc.] to come. Please [insert specific action you want legislator to take: introduce a bill requiring smarter salting practices, co-sponsor an existing bill, etc.].

Sincerely,

[Signature]

[Your name]

Once you put salt down, it
doesn't go away...



Salt alters the soil, harms plants, and
weakens infrastructure like bridges and roads.

It gets into our streams, lakes, and rivers,
putting aquatic life and human health at risk.



It only takes
1 teaspoon of salt...



...to pollute
5 gallons of water

Factsheets developed with help and resources from
Wisconsin Salt Wise

SALT WATCH KEY PARTNERS



Salt Watch would not be a success without the hard work, dedication, and collaboration from our partners! Groups across the country such as the Pennypack Ecological Restoration Trust (PA), Wisconsin Salt Wise (WI), Friends of the Rouge (MI), and Coon Creek Watershed District (MN), just to name a few! Check out the above map to see more of our key partners across the country, from government agencies to school groups. *This map is not comprehensive, and we are adding new partners every day!* **View the interactive Salt Watch Partner Map here: <https://arcg.is/1a0izX>**

We'd also like to thank Minnesota Pollution Control Agency, Izaak Walton League of America Endowment, Chesapeake Bay Restoration Fund, and many individual donors that make Salt Watch a success.

To get your organization involved in Salt Watch, please **email us at saltwatch@iwla.org**

SALT WATCH 2019-2020 SEASON

In the 2019-2020 Salt Watch season, we saw growth compared to the previous season, distributing over **1000 Salt Watch Kits** and pulling in about **750 Salt Watch readings**. For much of the country it was a fairly mild winter (especially in the Mid-Atlantic region), and as a result, less road salt was spread (and more green dots on the map, indicating low chloride levels in streams).

Even so, areas such as the Twin Cities (MN), Detroit (MI), and the DC Metro Region saw spikes in chloride pollution, signaling that the problem would likely get much worse during a winter with more significant winter precipitation.

To view past years' Salt Watch results, visit www.iwla.org/saltwatchresults and scroll down to view past season maps.

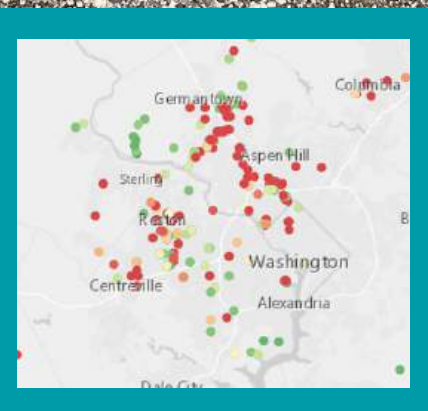


SALT WATCH 2020-2021 SEASON

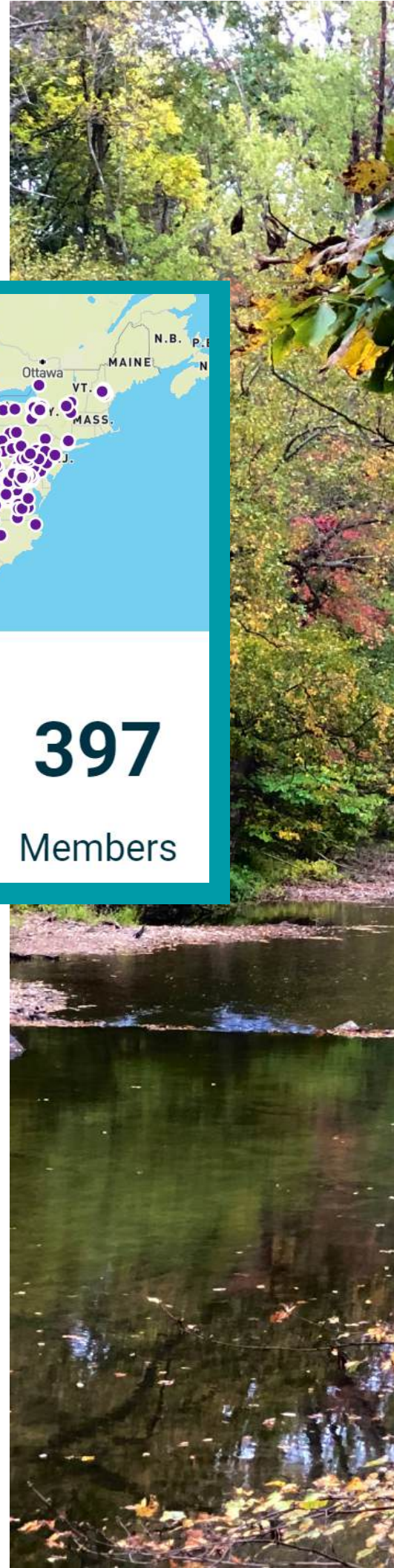
In the 2020-2021 Salt Watch season, it has already surpassed our expectations in terms of interest and growth! As of March 2021, we have sent over **2500 kits** and seen over **1000 results** come in! This winter has been much snowier across the country, with several snow events even in the DC Metro Region.

This increased winter precipitation has resulted in extremely high chloride levels across the country (and thus, more red dots on the map shown below). These spikes have even garnered media attention, with Salt Watch making it into the Washington Post and on WAMU. To read these articles and more, visit www.iwla.org/salt-watch-news

To view this season's Salt Watch Map (updated weekly), visit www.iwla.org/saltwatchresults.



CLEAN WATER HUB



4940

Stations

48178

Samples

86

Organizations

397

Members

The Clean Water Hub saw new growth in 2020, thanks to funding from the Pisces Foundation (through the Water Data Collaborative, www.waterdatacollaborative.org) and the Raines Family Foundation. Many new organizations have joined the Hub and started adding their data, old and new, and we even have seen monitors using their Clean Water Hub site links to show problems with water quality and promote restoration, awareness, and change.

Additionally, in 2020, the Hub got a face-lift with **updated home pages** and **organization pages**, new organizational capabilities like **data downloads**, displaying **partner organization data**, and the ability to **embed the Hub map on your own organization's website**.

To join the Clean Water Hub, see water quality data (new and old), and add your own data, visit www.cleanwaterhub.org!

SAVE OUR STREAMS



Photo by Sam Briggs at the Chesapeake Conservations Corps SOS field day, 2020

In 2020, Save Our Streams went virtual for the first time ever! With many trainings cancelled in the spring, Clean Water Program staff opted to create an online training program, that would do that classroom portion of Save Our Streams trainings via webinar.

Program staff did 6 live webinars (3 intro to water quality and 3 intro to macroinvertebrate presentation) and posted the recordings to www.iwla.org/workshops for anyone to watch when they are able. **318 people participated in online training**, with **91 completing online certification** (and are just awaiting a field day to become fully certified).

In the fall, Sam Briggs was able to train 10 Chesapeake Conservation Corps in Save Our Streams at IWLA headquarters, proving that field days can be carried out in a safe and socially distant manner (with hand sanitizer and extra equipment to keep everyone separated).



IOWA SAVE OUR STREAMS

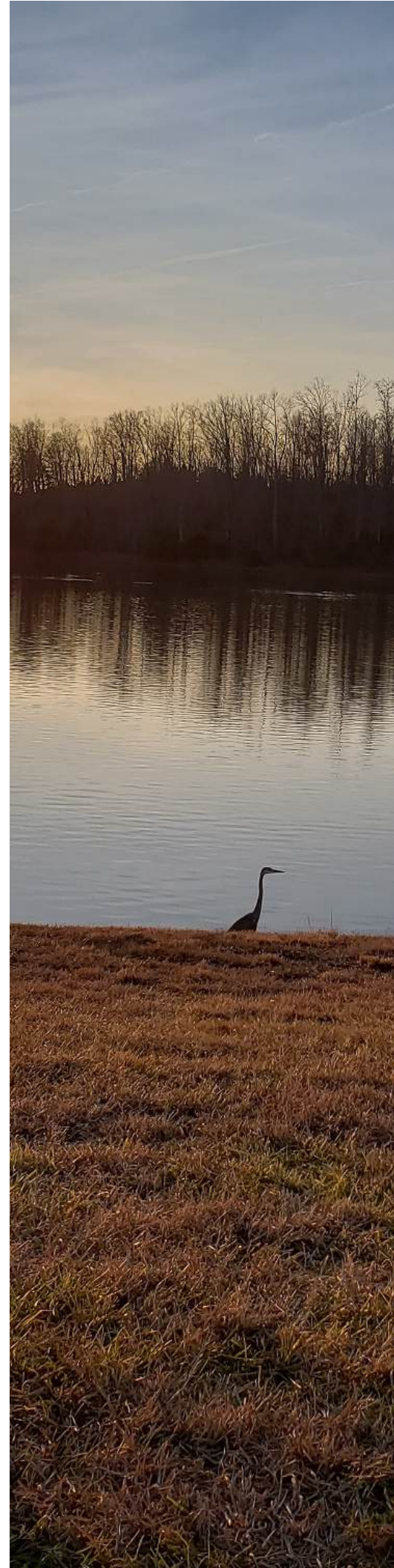
In Iowa (in the fall of 2020), SOS Coordinator Zach Moss was able to lead **2 field days** for **12 attendees** who had completed the new online training format. **8 of these attendees moved on to become certified.**

Despite the COVID-19 pandemic, there still was growth of monitoring Iowa. The **Clean Water Hub now has 12 organizations from Iowa**, and **Chemical monitoring sites increased from 16 to 56**. Zach has also been developing new partnerships in Iowa and strengthening existing partnerships.

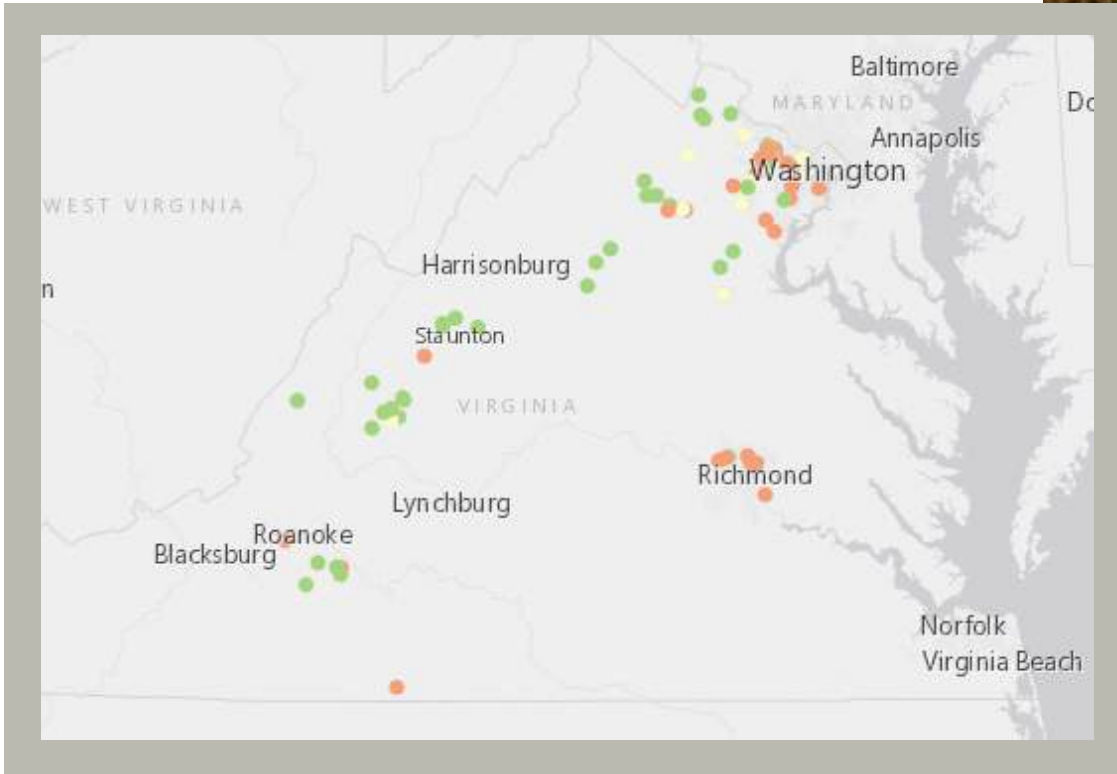
Clean Water Program Staff were **awarded the REAP Conservation Education Grant from IA Department of Natural Resources** for Save Our Streams monitoring in 2021. Additionally, Clean Water Program staff **plan to implement equipment loan stations across the state** for volunteers to utilize free of charge.



Photo by Zach Moss at the Cedar Rapids field day, 2020



VIRGINIA SAVE OUR STREAMS



2020 VASOS results. Green dots are acceptable water quality, red dots are unacceptable, and cream dots are grey area and need further monitoring.

In Virginia, our revised Quality Assurance Project Plans were signed in early 2020 (to ensure our data is used by the Virginia Department of Environmental Quality).

Virginia monitors still were able to monitor and grow! As of the end of 2020, **82 individuals had started the online training process**, and of those **41 individuals have completed the online training process and received an online training certificate**. Although monitoring was severely limited this spring, some single-household monitoring groups were still able to collect data. **158 monitoring events took place in 2020** (see map above).

Even with social distancing measures, some volunteer trainers were still able to safely train and certify new monitors following the online training portion run by SOS staff. 20 new monitors were certified in 2020, primarily in the Northern Virginia and Richmond regions.

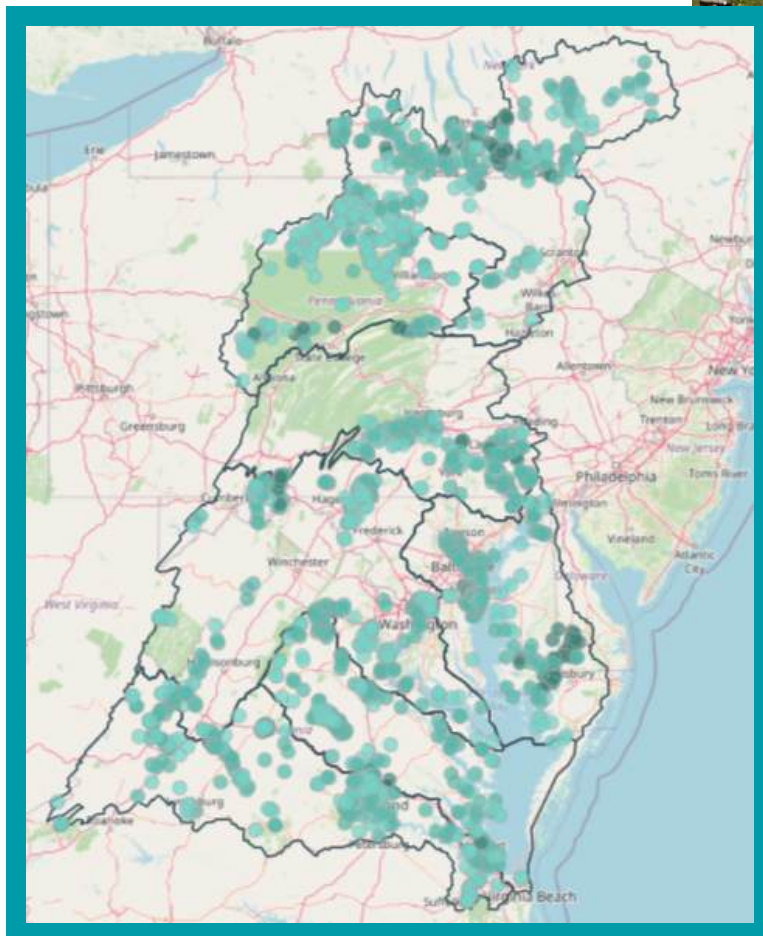


CHESAPEAKE MONITORING COOPERATIVE

The League is finishing up a 6 year grant with the Alliance for the Chesapeake Bay and the Chesapeake Bay Program for our work as a partner in the Chesapeake Monitoring Cooperative and we are laying the groundwork for the next 6 years of the project.

We have had many achievements over the years, and 2020 was an opportunity to grow and embrace new challenges. We took our scaled back training schedule as an opportunity to focus on our data. We were able to add **over 100 thousand data points to the Chesapeake Data Explorer**, and we held **a Hackathon with Booz Allen Hamilton** to synthesize and understand what our years of volunteer-collected data could tell us about water quality in the Chesapeake Bay Watershed.

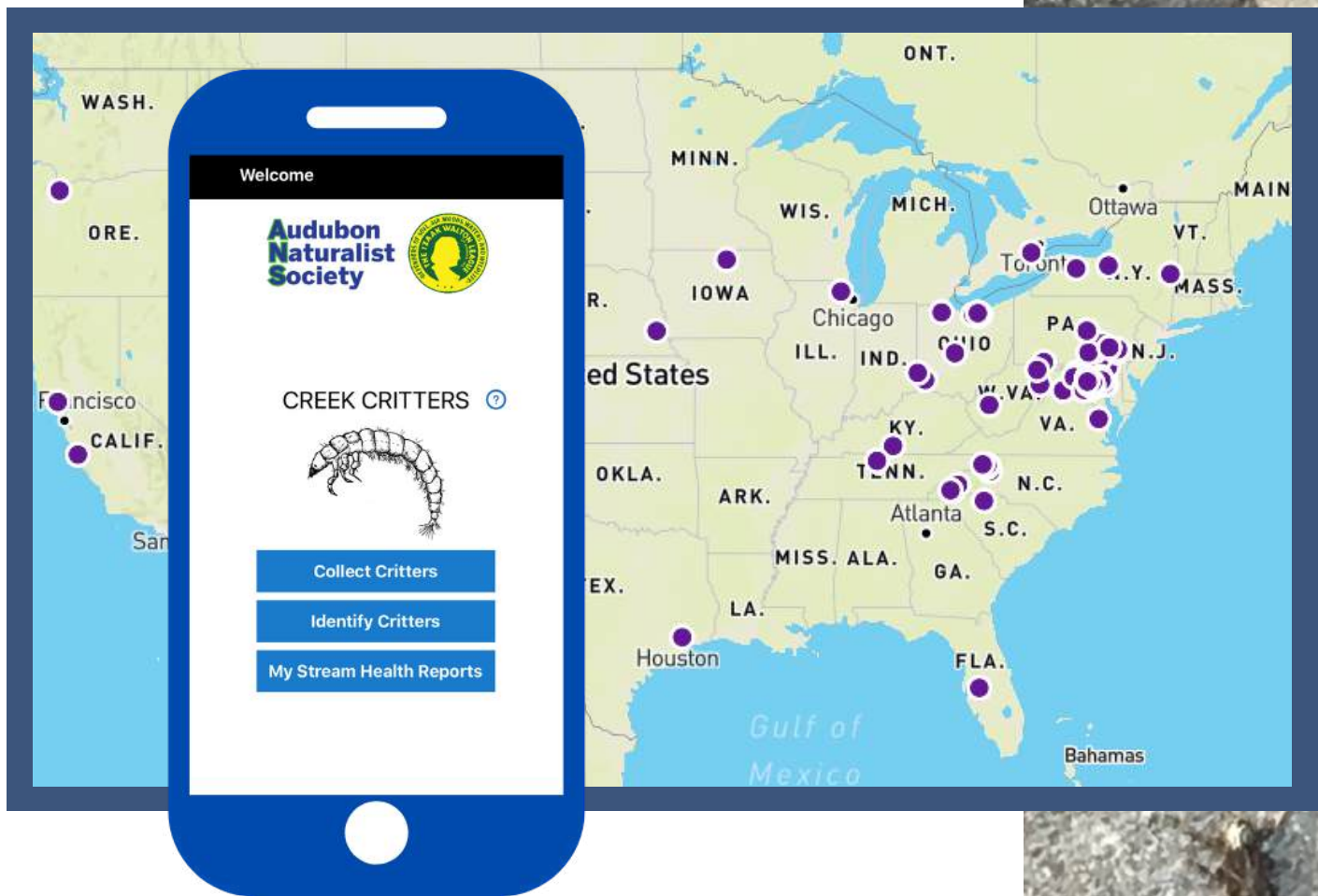
To read more specifically about the achievements of the Chesapeake Monitoring Cooperative over the last 6 years, click the link below and scroll down to the "CMC Achievement Report."
<https://www.chesapeakemonitoringcoop.org/resources/publications>



Tons of data in the Chesapeake Data Explorer!



CREEK CRITTERS



In **partnership with the Audubon Naturalist Society** in Maryland, IWLA has launched a **new Creek Critters app!** Free to download for iOS or Android smart phones, Creek Critters introduces kids, adults, and everyone in between to macroinvertebrate monitoring.

Thanks to a grant from the Raines Family Foundation, Clean Water Program Staff were not only able to promote the app, they were also able to connect it to the Clean Water Hub so the data can be seen there. To see the Creek Critters data in the Hub, visit www.cleanwaterhub.org/organization/72.

To get involved with Creek Critters, all you need is a small aquarium net, a smart phone, and access to a stream! To learn more about the app, visit www.iwla.org/creekcritters.



OUR VALUED VOLUNTEERS



The **50th anniversary of Earth Day** occurred right after stay at home orders came about – so we really needed to be creative when it comes to "face time" with our volunteers! We launched a Stream Selfie Blitz and collected almost **200 Stream Selfies**, with donors matching a dollar amount to every Selfie Submitted.

We also worked hard to collect **volunteer success stories**, with some quotes pictured below. We had volunteers celebrating the health of their stream, getting their local park to stop using pesticides, and making a difference with Salt Watch! Send us your successes to sos@iwla.org to be featured on our social media channels, and thank you for all that you do!

“

I like to think of myself as a fly fisherman first and a neurosurgeon second.

JOHN FELDENZER
Jackson River, Virginia

“

"They say that one person can't make a difference. I really feel like they can."

PAM WOLTER
Quarter Section Run, Iowa

GET INVOLVED

Want to become an advocate for local streams? There are so many ways to get involved with Save Our Streams, and anyone can volunteer! Find out how to get involved in our different programs today:

Save Our Streams: www.iwla.org/sos

Winter Salt Watch: www.iwla.org/saltwatch

Clean Water Hub: www.cleanwaterhub.org

Chesapeake Monitoring Cooperative:

www.chesapeakemonitoringcoop.org

Virginia Save Our Streams: www.vasos.org

Creek Critters: www.iwla.org/creekcritters

Follow us on social media to keep up with the latest SOS news and updates, and subscribe to our Stream Monitor newsletters at iwla.org/water! Share your own success stories and lessons learned by tagging us on social media or emailing us directly. Drop us a line at sos@iwla.org.

Our work simply couldn't be done without our hundreds of dedicated volunteers. THANK YOU to all of our monitors across the country: you are the first line of defense for clean water. Now more than ever we need your data and your voice to protect our nation's waterways. Together we can educate our communities, collect critical data, and Save Our Streams!



@saveourstreams



@saveourstreamsIwla

