



Waterless Cleaning Systems

**Invasive Species Public
Prevention Infrastructure**

**CD³ General Benefit Corporation
2019**

- AIS North American Scalability
- Barriers to AIS Prevention Action
- Waterless Technology
- 3rd Party Research
- Digital Public Engagement Features
- Questions

Invasive Species Problem



**INVASIVE SPECIES
COST THE US ECONOMY**

\$146+

BILLION/YEAR

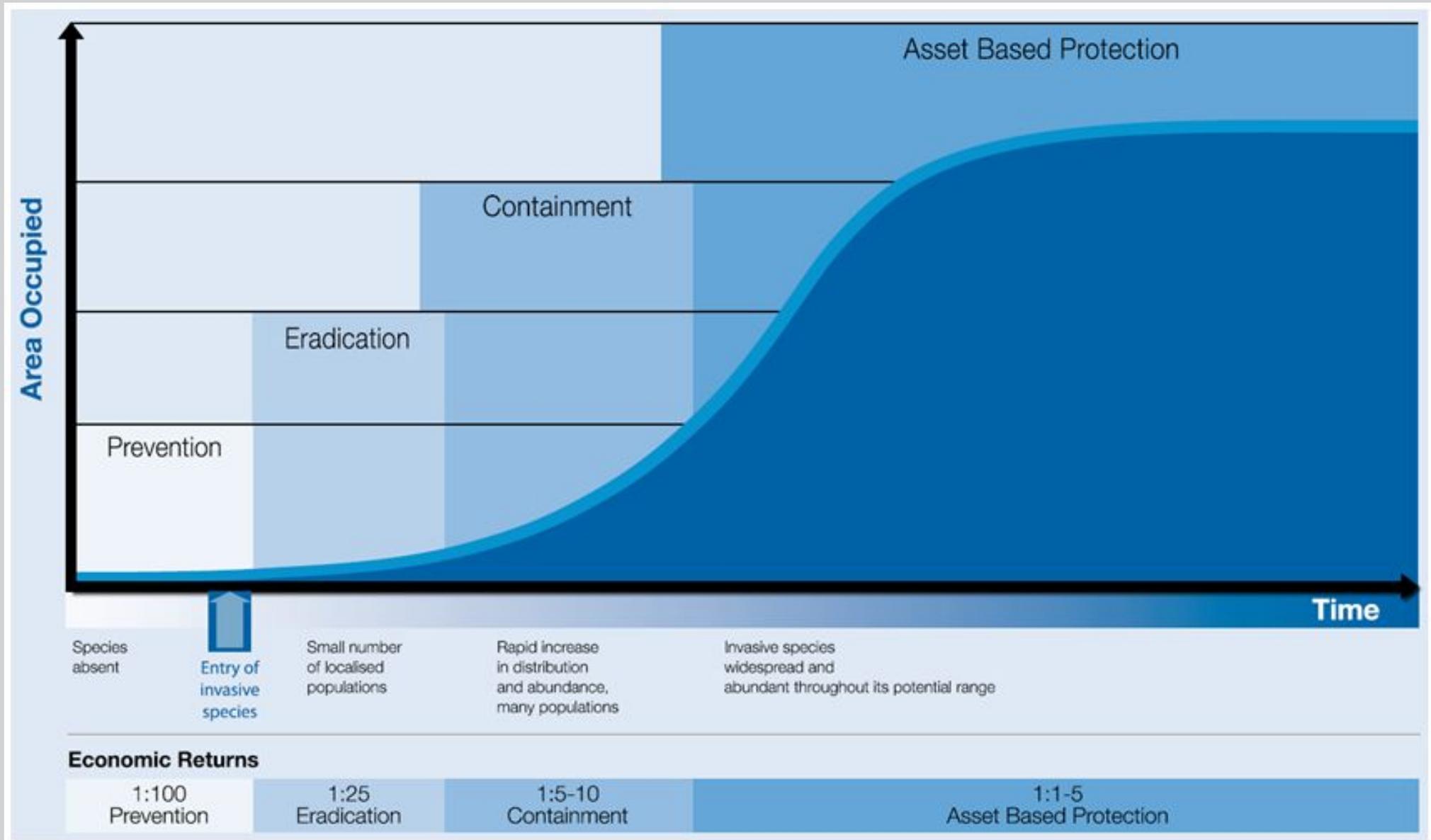


BOATERS NEED TOOLS



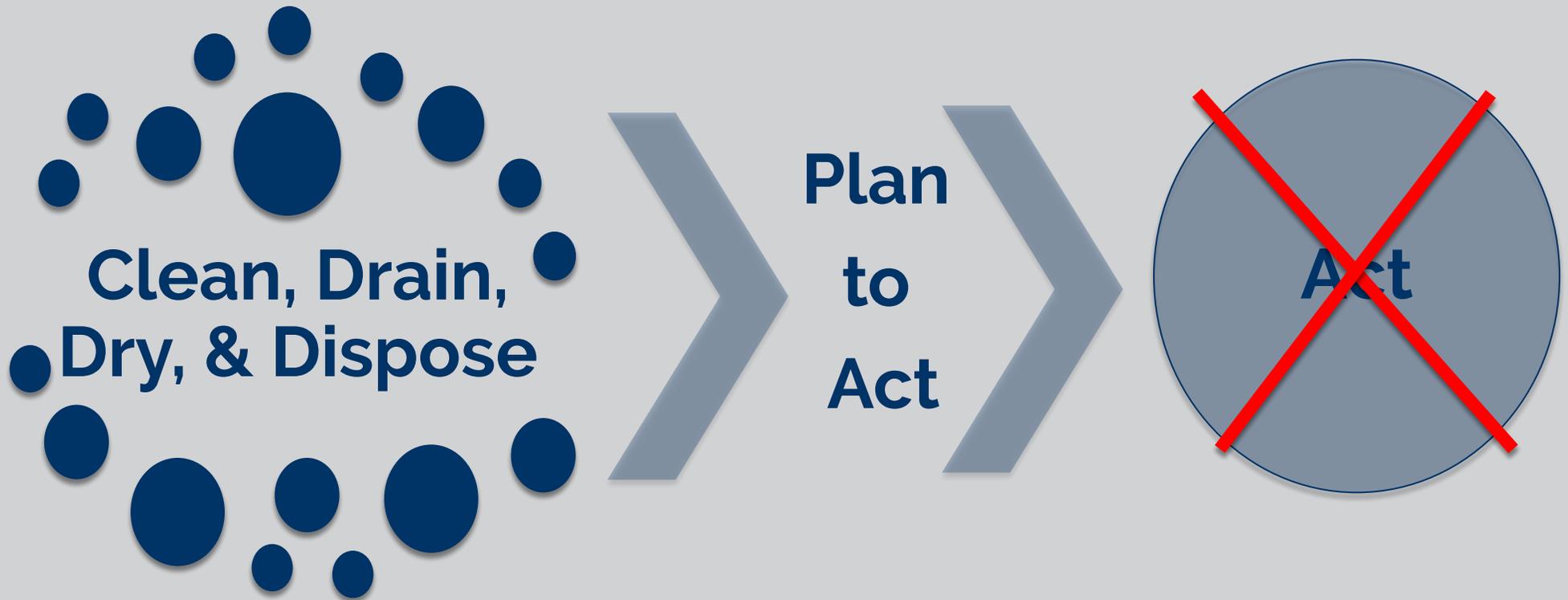
**EXISTING SOLUTIONS
ARE COSTLY AND
CANNOT SCALE**

Invasion Curve = Reality



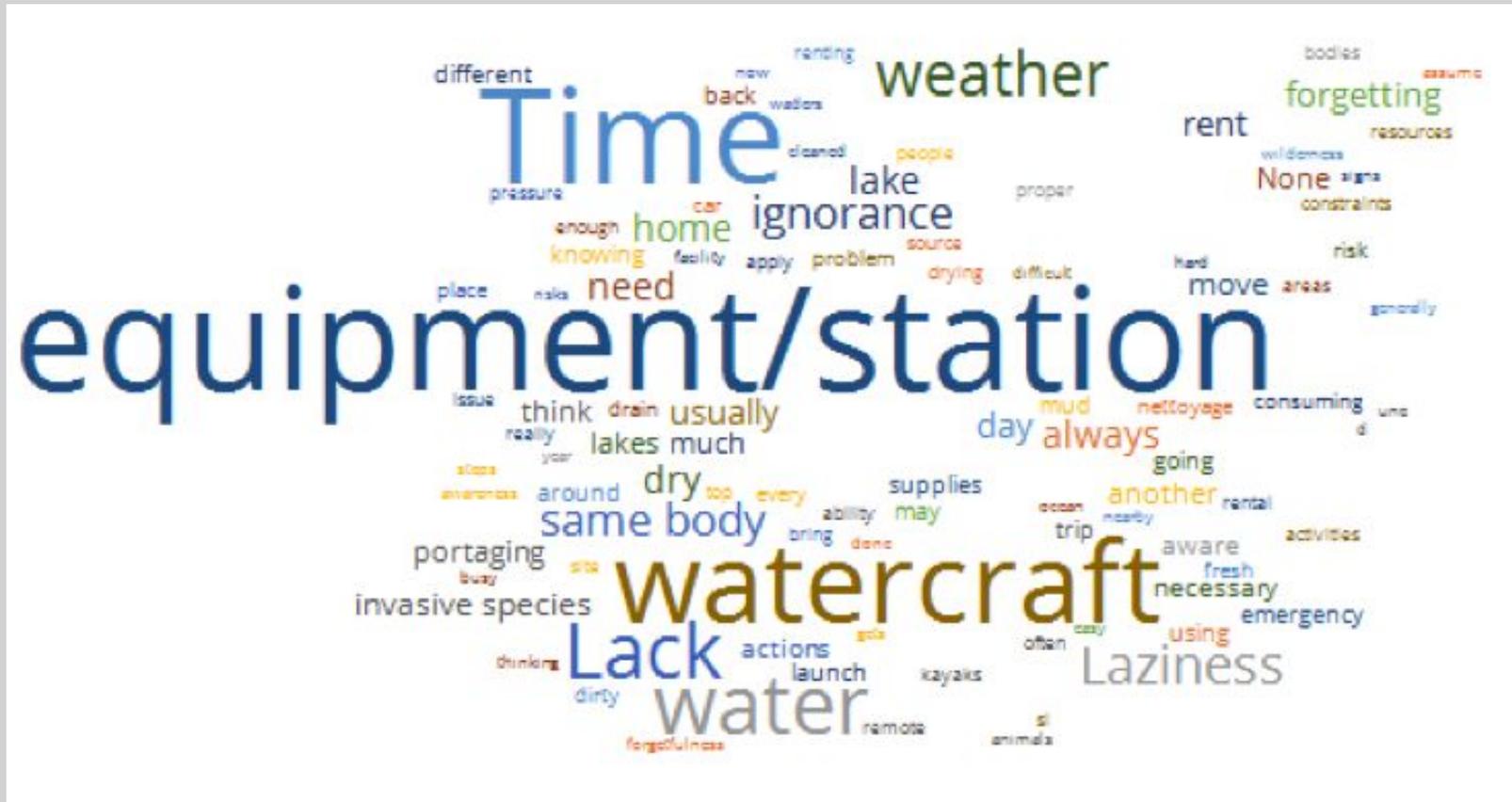
“An ounce of prevention is worth a pound of cure.”

What people are doing



Dayboaters FAIL to take action

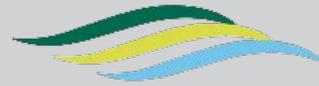
What the public wants



Word Cloud Image Courtesy of Canadian Council on Invasive Species

“Give ‘em the TOOLS”

Technology Development



Three Rivers
PARK DISTRICT



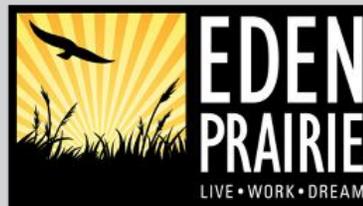
Minnesota Pollution
Control Agency



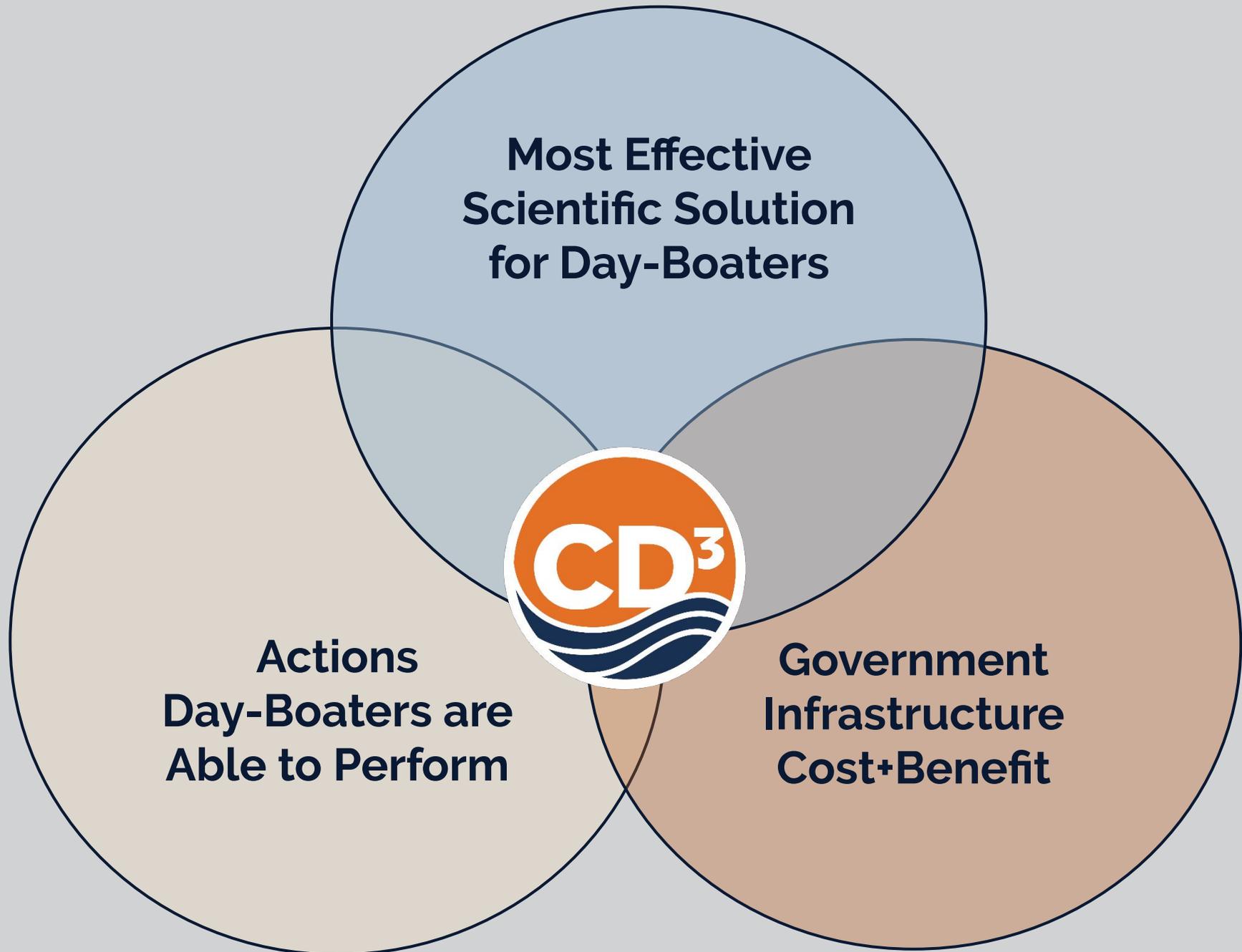
Minnesota
DNR



Texas Park &
Wildlife



How CD³ Approached Design



What can infrastructure do?



**EMPOWER
THE
PUBLIC**



**HELP STOP
THE SPREAD
OF AIS**

Everybody Likes a Clean Boat

Free-to-Use Waterless Tools



Videos of CD³ System Use



[CD3 YouTube Channel](#)

CD³ Systems Overview



**INTERNET
CONNECTED**

**TETHERED
TOOLS**

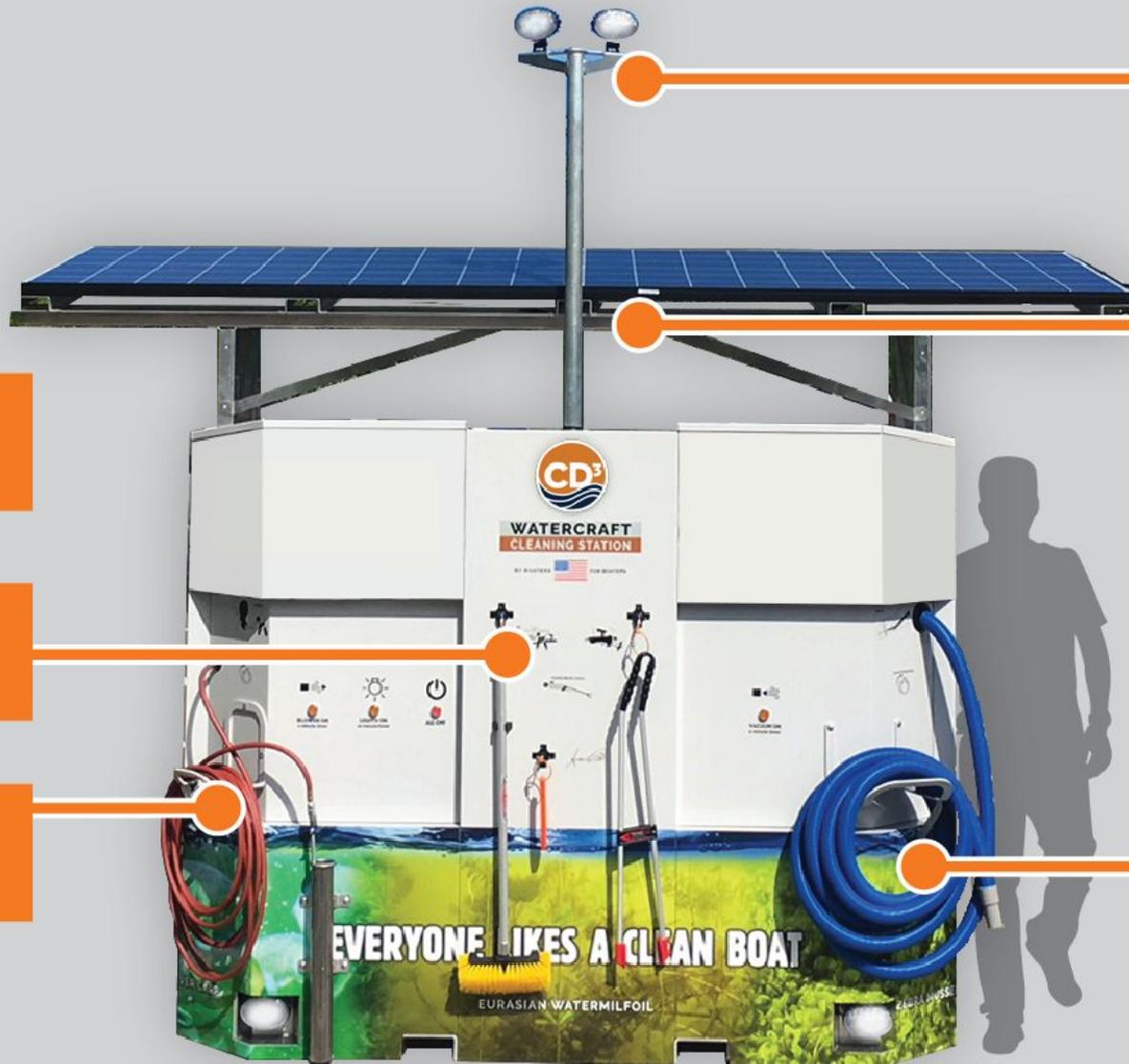
**AIR
BLOWER**

**TOP/BOTTOM
LED LIGHTS**

**OFF-GRID
SOLAR POWER**

**EDUCATIONAL
KIOSK AND
DECALS**

**WET/DRY
VACUUM**



Model Options



Outpost

Wayside

Model Options



Station

Trailer

AIS Infrastructure Installation



Public Use: Online Tools



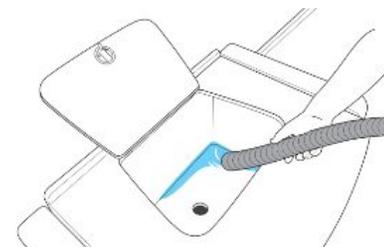
www.StopAIS.com



Clean off trailer



Suck out all water in boat



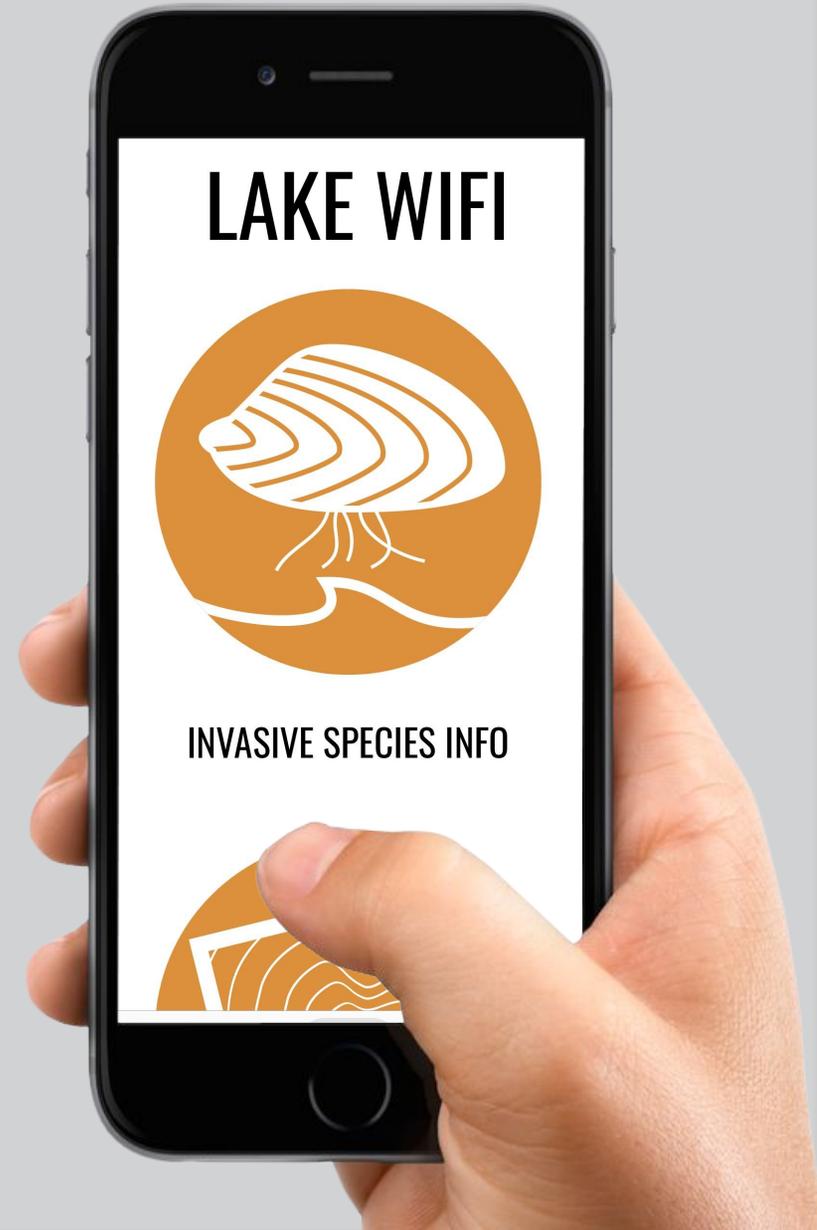
Check for zebra mussels



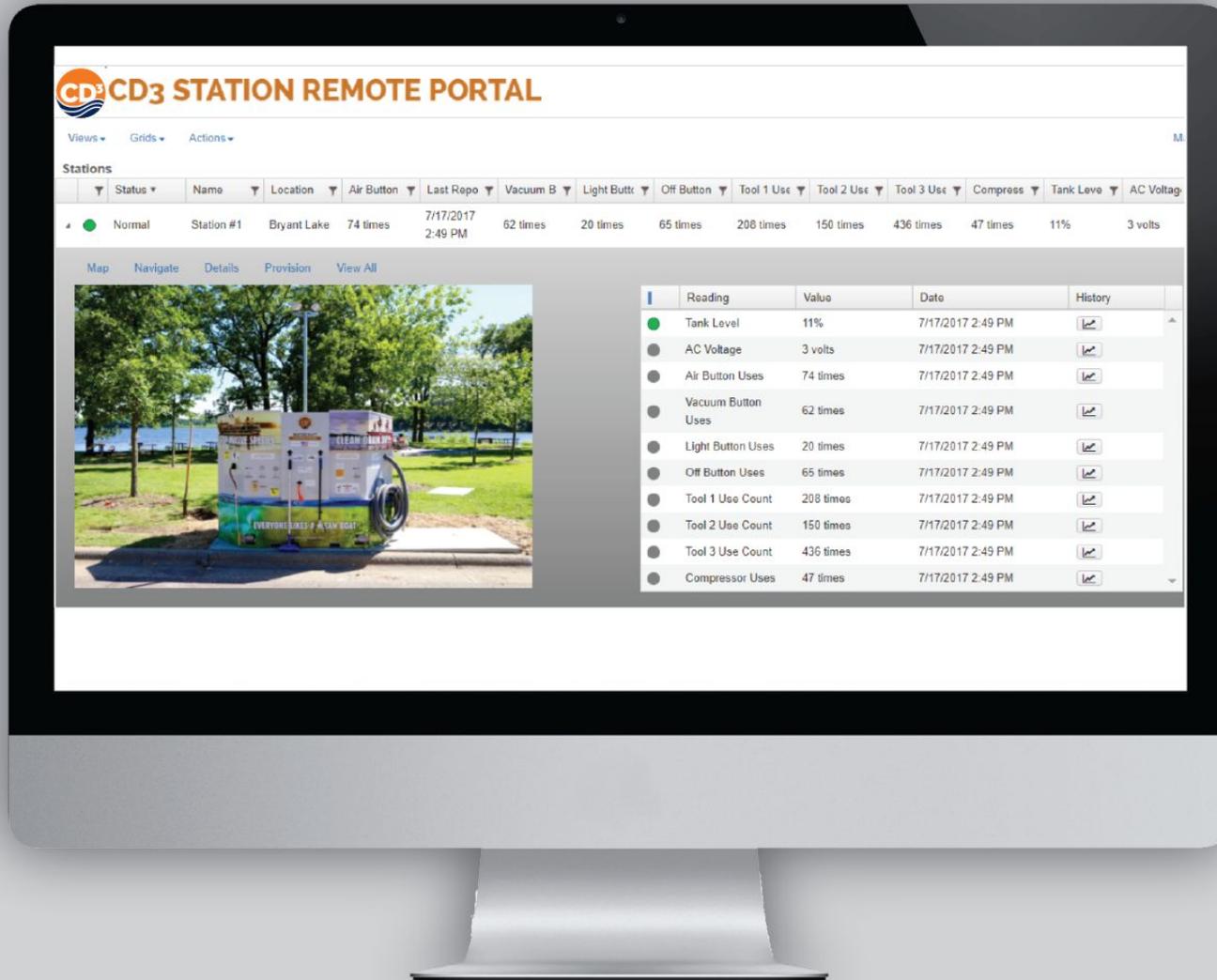
Public Use: LAKE WIFI



www.InvasiveWiFi.com

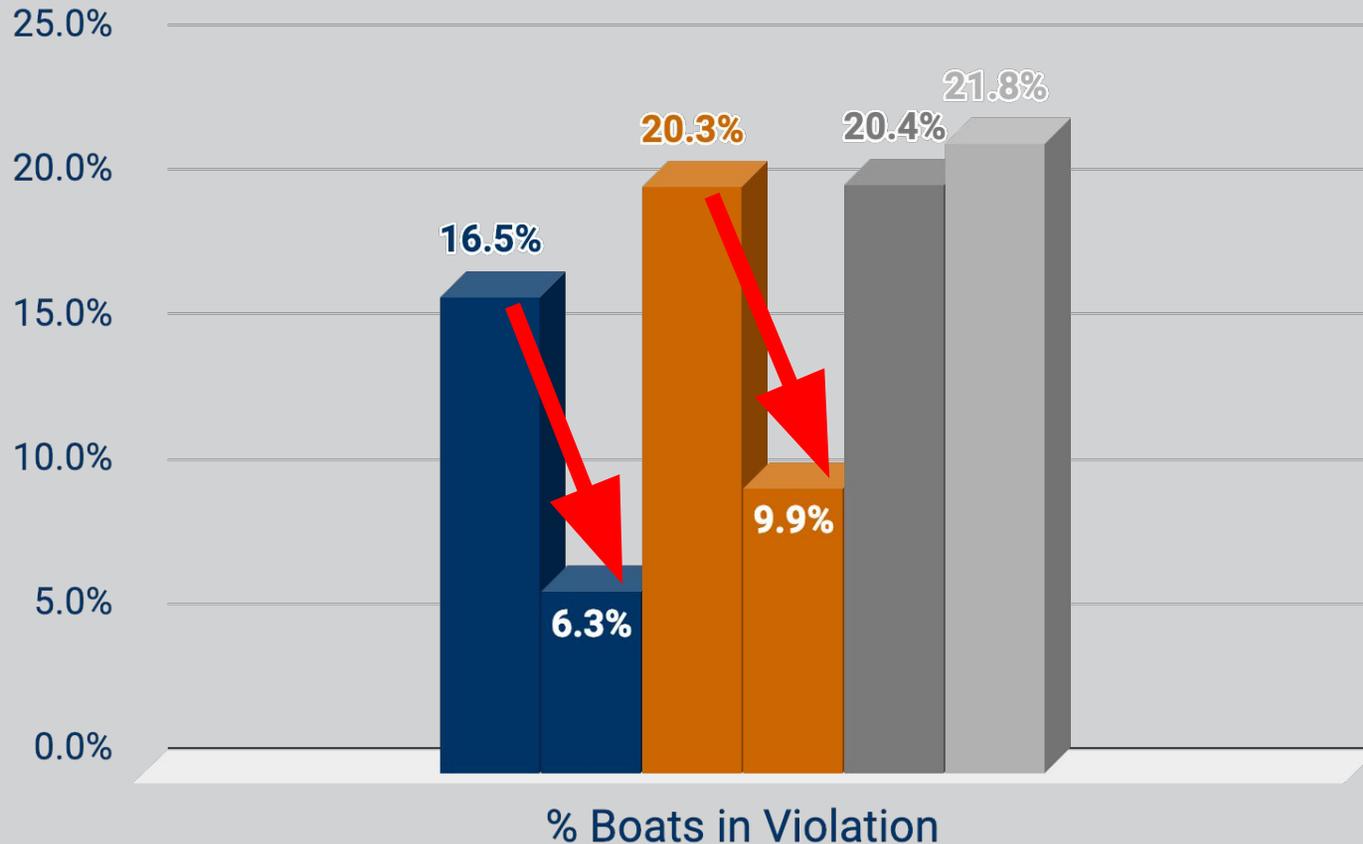


Online Data Platform



www.MyCD3Station.com

Real Results - 3 Years of Data



**CD³ SYSTEMS FACILITATE A
70% DECREASE
IN AIS VIOLATIONS**

Public Use Research Data



**BOATERS USE CD3
EVEN WHEN
DNR INSPECTORS
ARE NOT PRESENT**



78%
RATED CD3 SYSTEMS AS
**'EASY' OR
'VERY EASY'**
TO USE



82%
SAID IT WAS
**'LIKELY' OR
'VERY LIKELY'**
THEY'D USE CD3 SYSTEMS AGAIN



678
**USES/MONTH/SYSTEM
IN '17-'18 PILOT**

Public Use Research Data



100%

**RESIDUAL H₂O
REMOVED FROM
LIVWELL**



**AUTOMATIC METRICS AND
MAINTENANCE ALERTS**

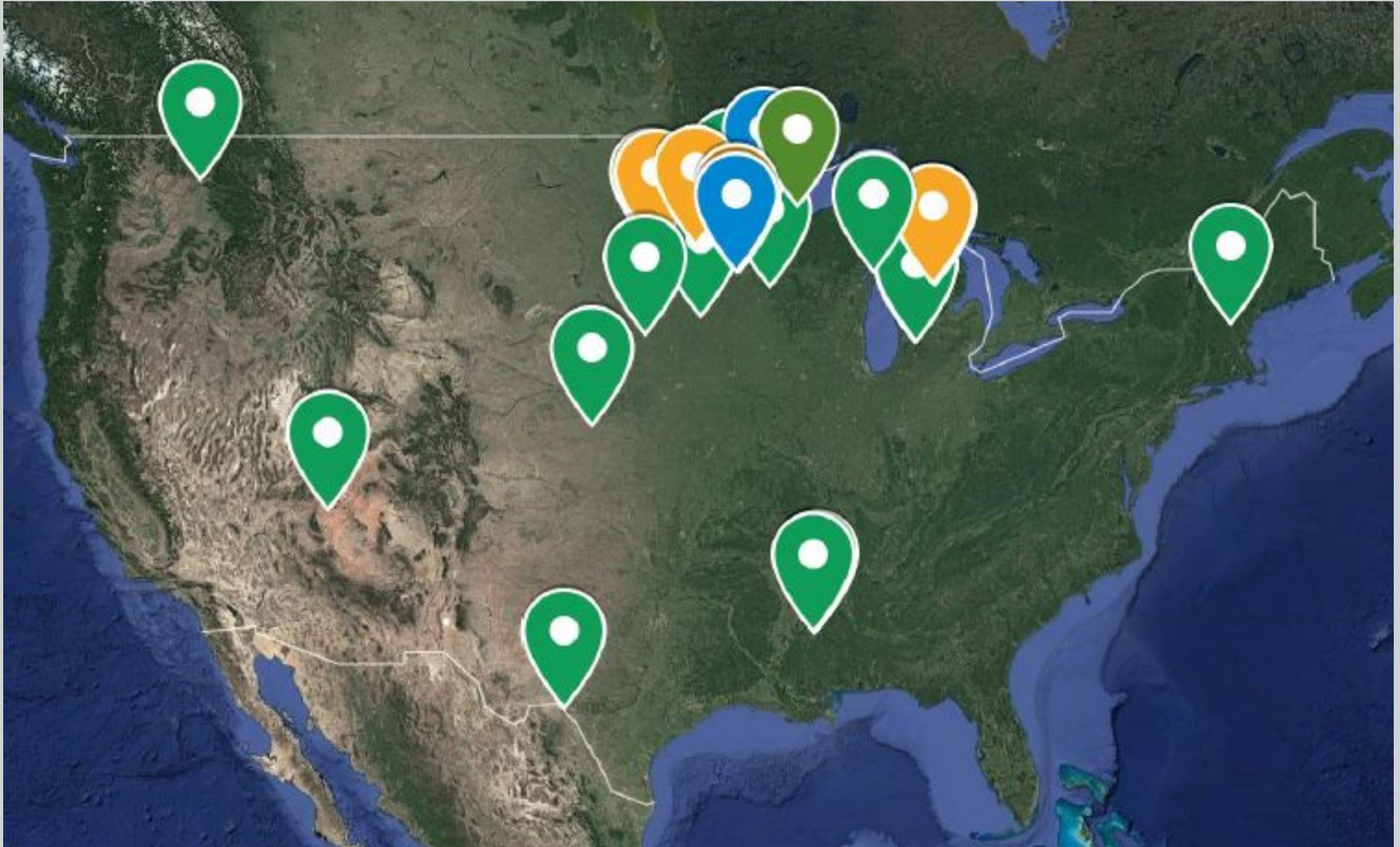


**LOW OPERATIONS AND
MAINTENANCE COSTS**

**DESIGNED TO REDUCE
THEFT AND VANDALISM**



Locations in USA



[Map of CD3 Systems](#)

Summary



Empowering the public to take ACTION

Science of Compliance



Plan
to
Act



Questions?



**Available on SupplyCore
Vendor # 19928**

Everybody Likes a Clean Boat

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