



Friends of Casco Bay
Casco BAYKEEPER

STORMWATER POLLUTION

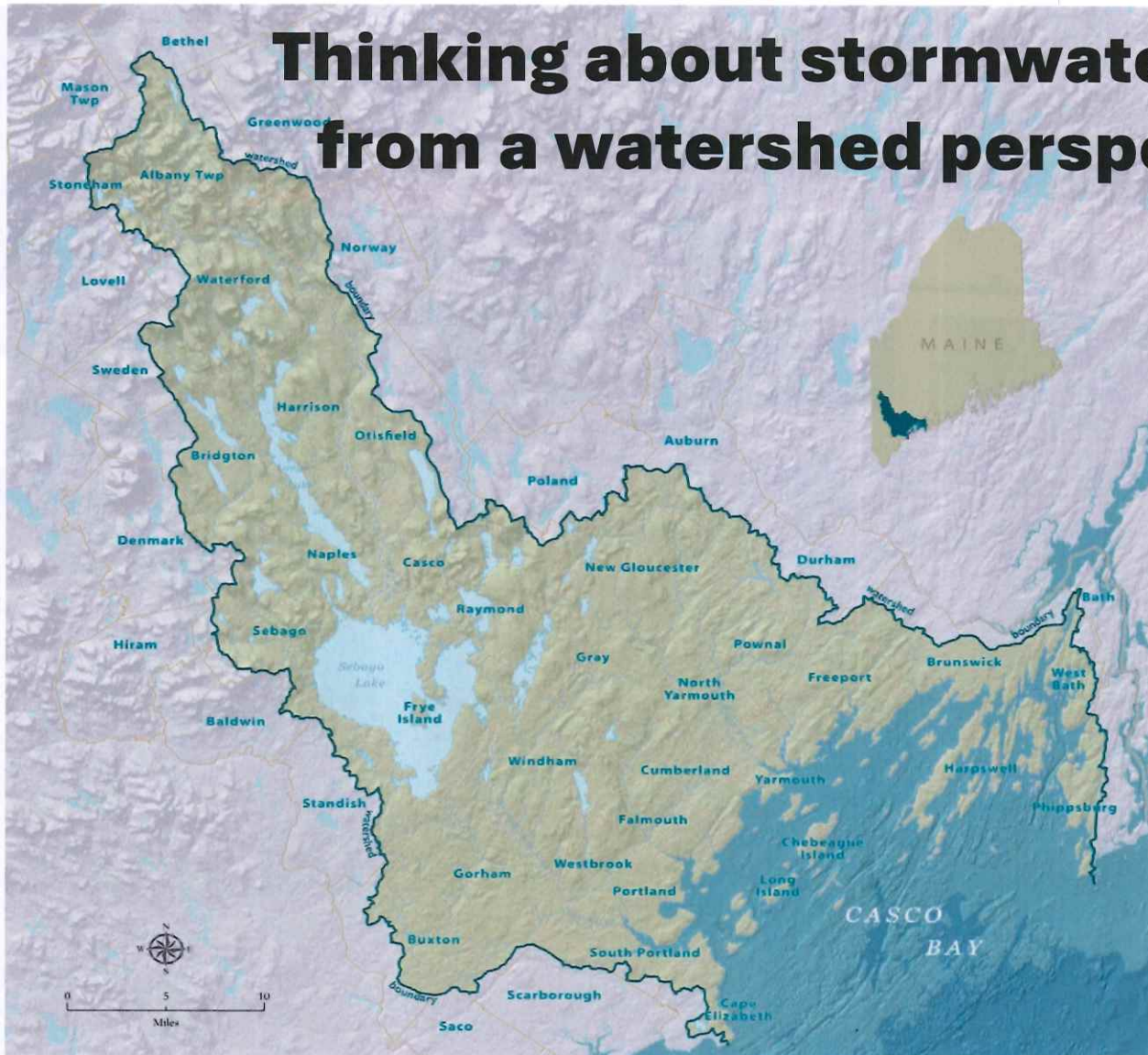
Introduction to the Problem



Ivy Frignoca Casco Baykeeper
Friends of Casco Bay
ifrignoca@cascobay.org
207-831-3067



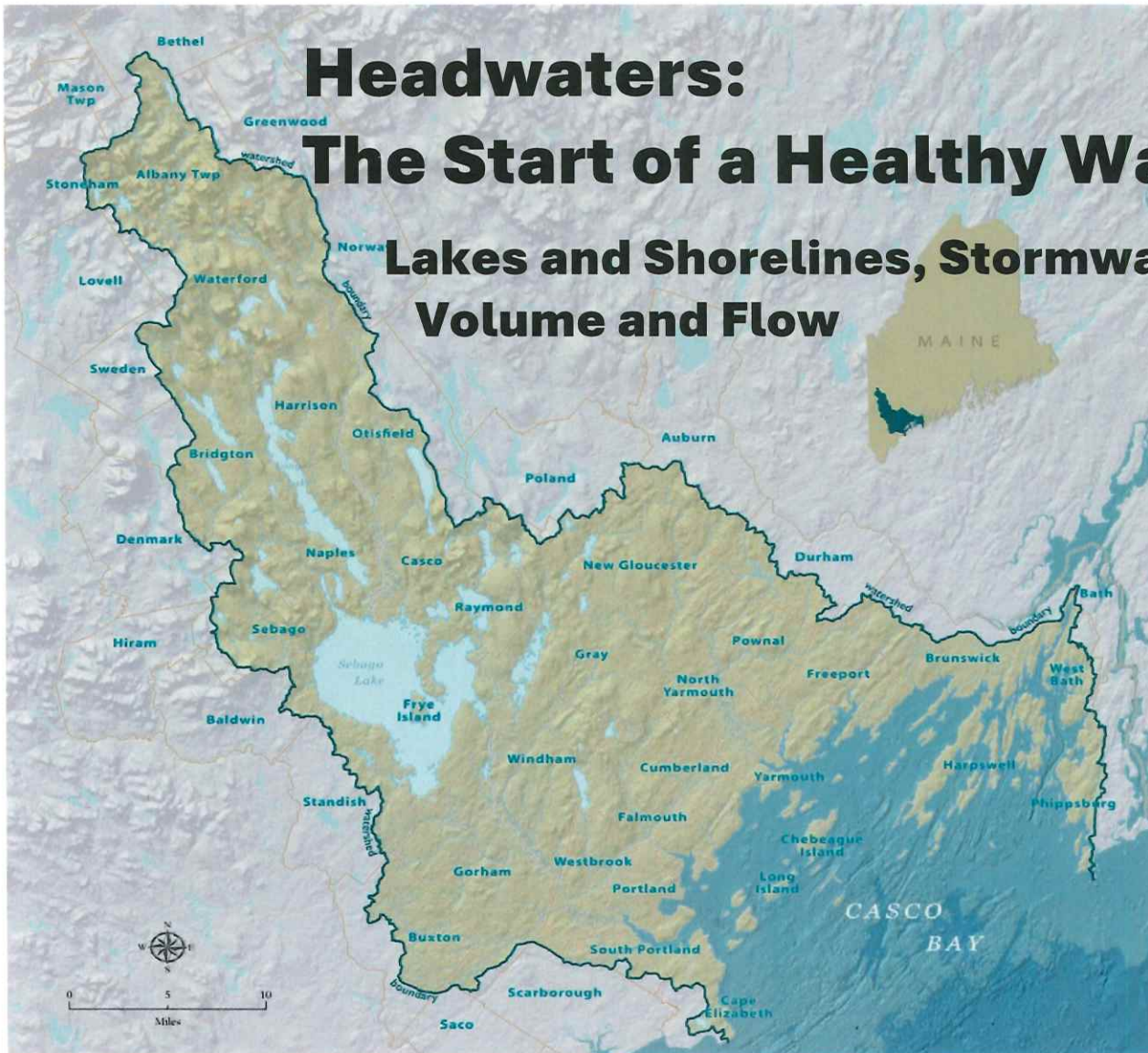
Thinking about stormwater from a watershed perspective





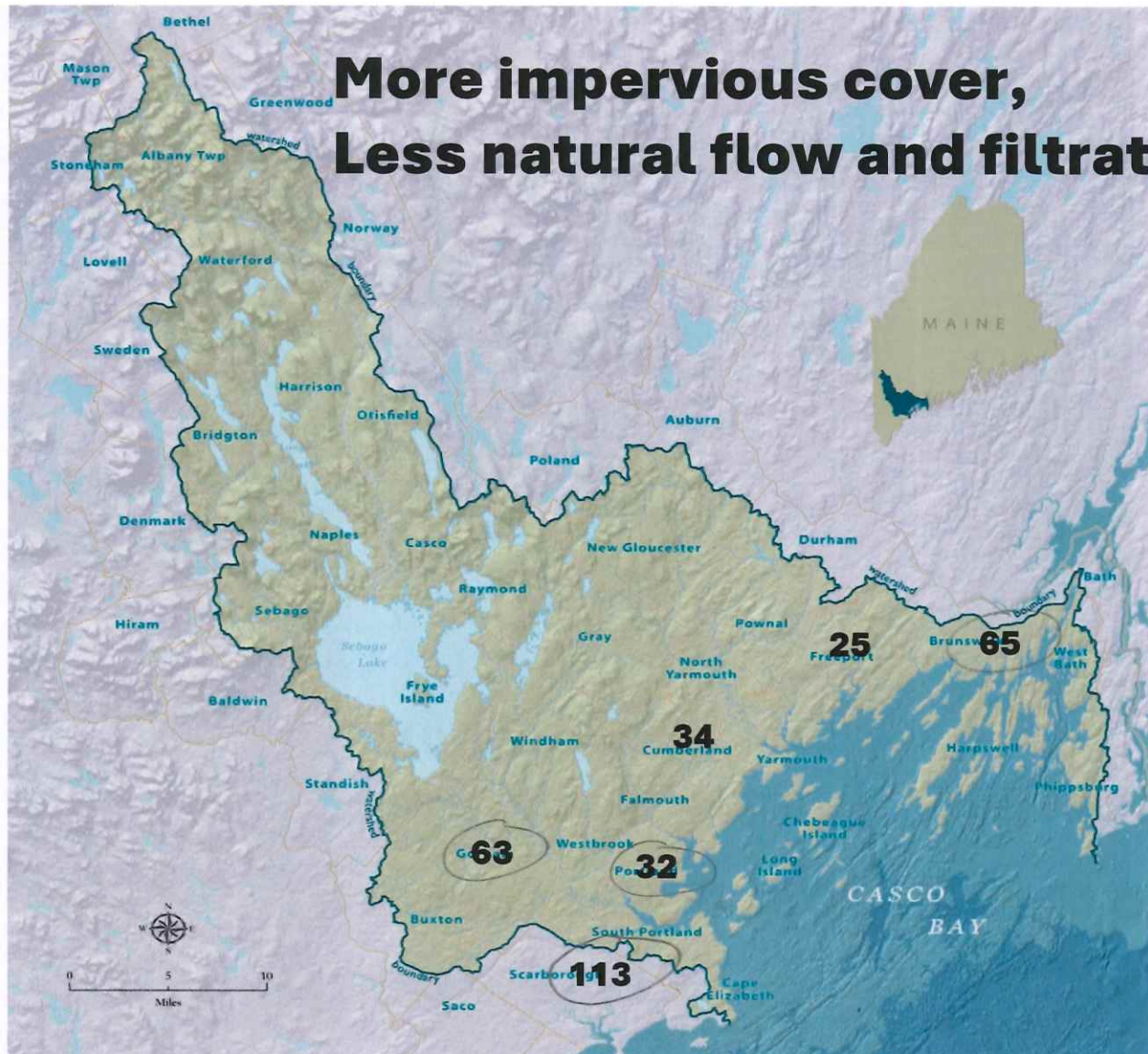
Headwaters: The Start of a Healthy Watershed

**Lakes and Shorelines, Stormwater
Volume and Flow**





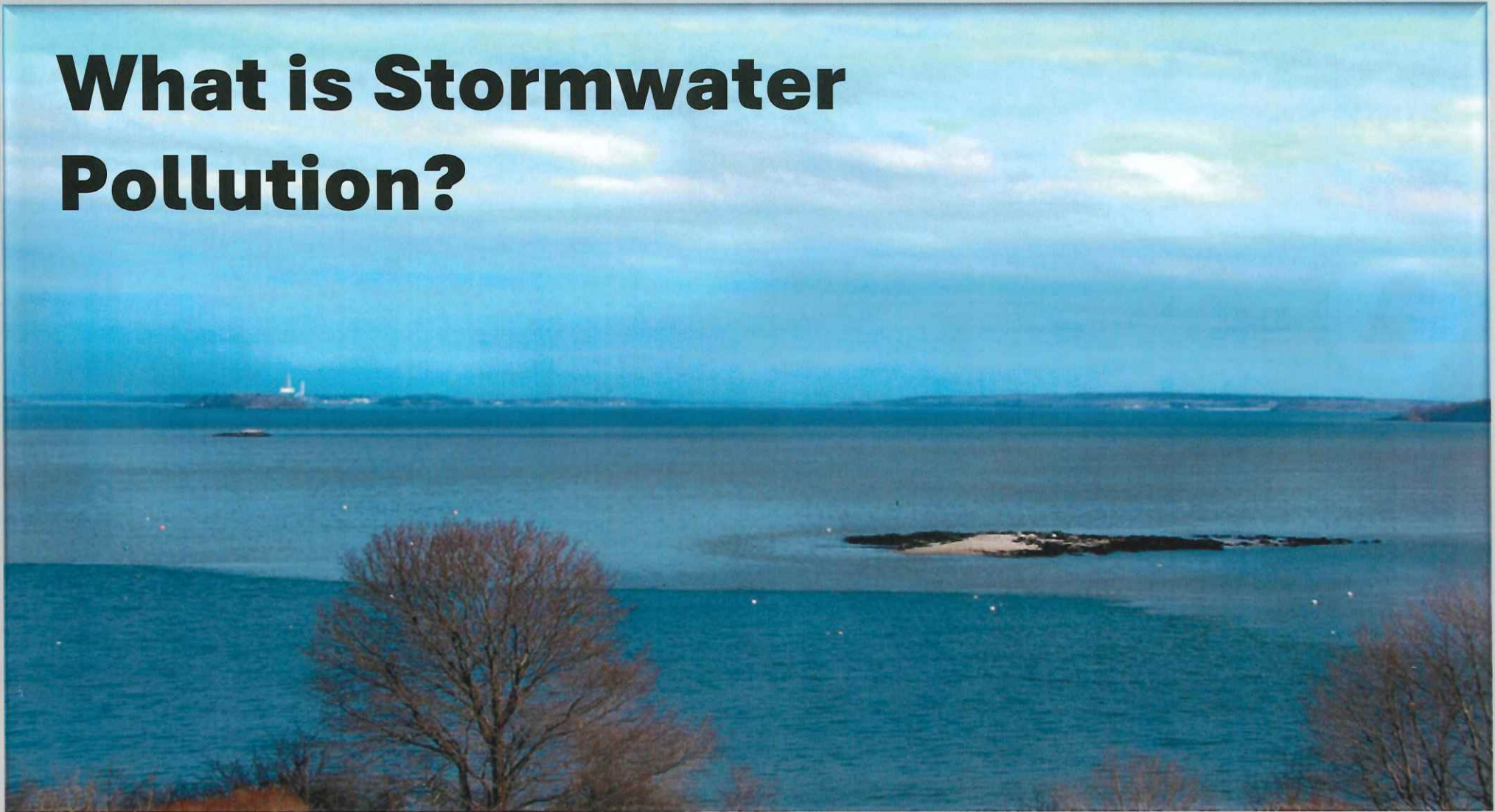
More impervious cover, Less natural flow and filtration



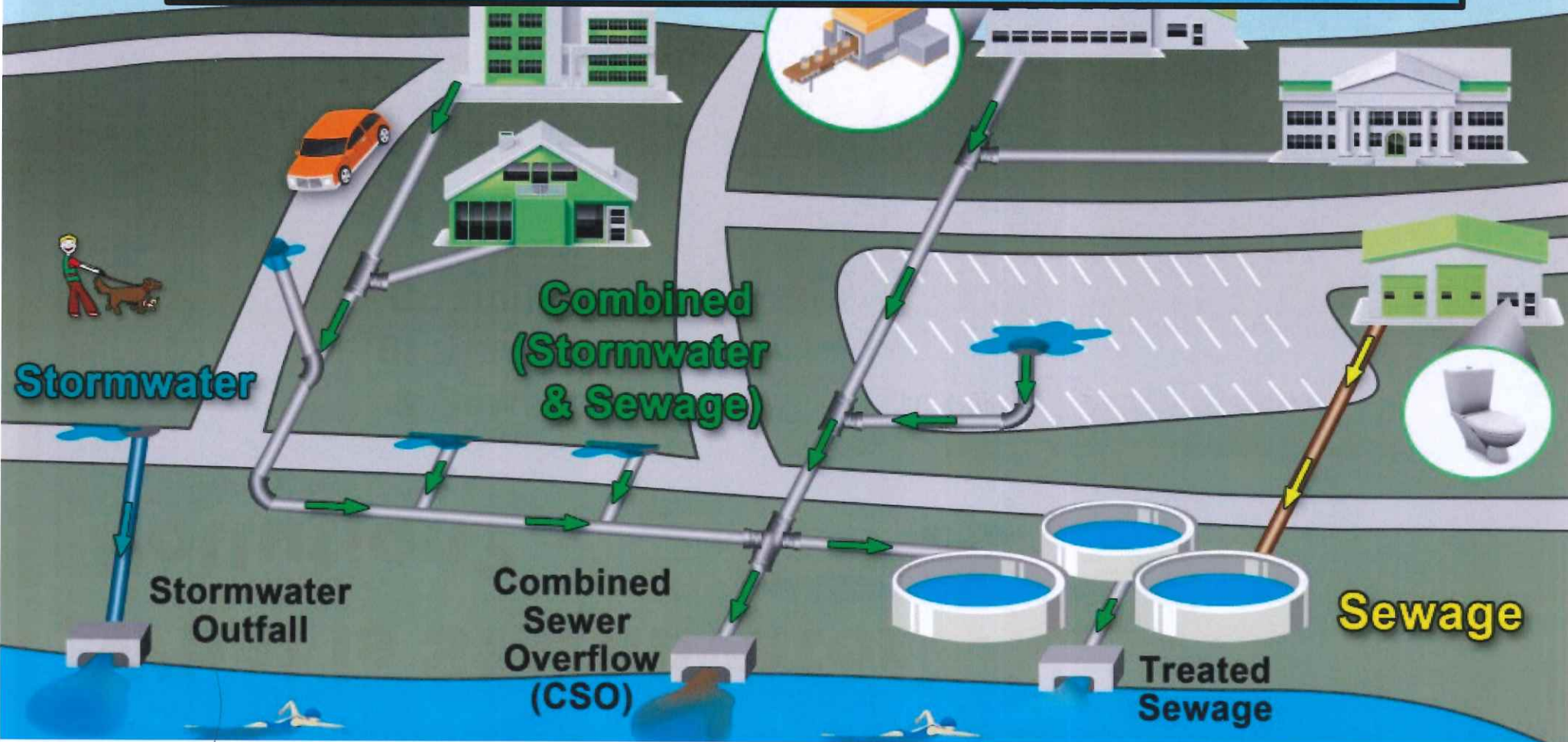
of permits



What is Stormwater Pollution?



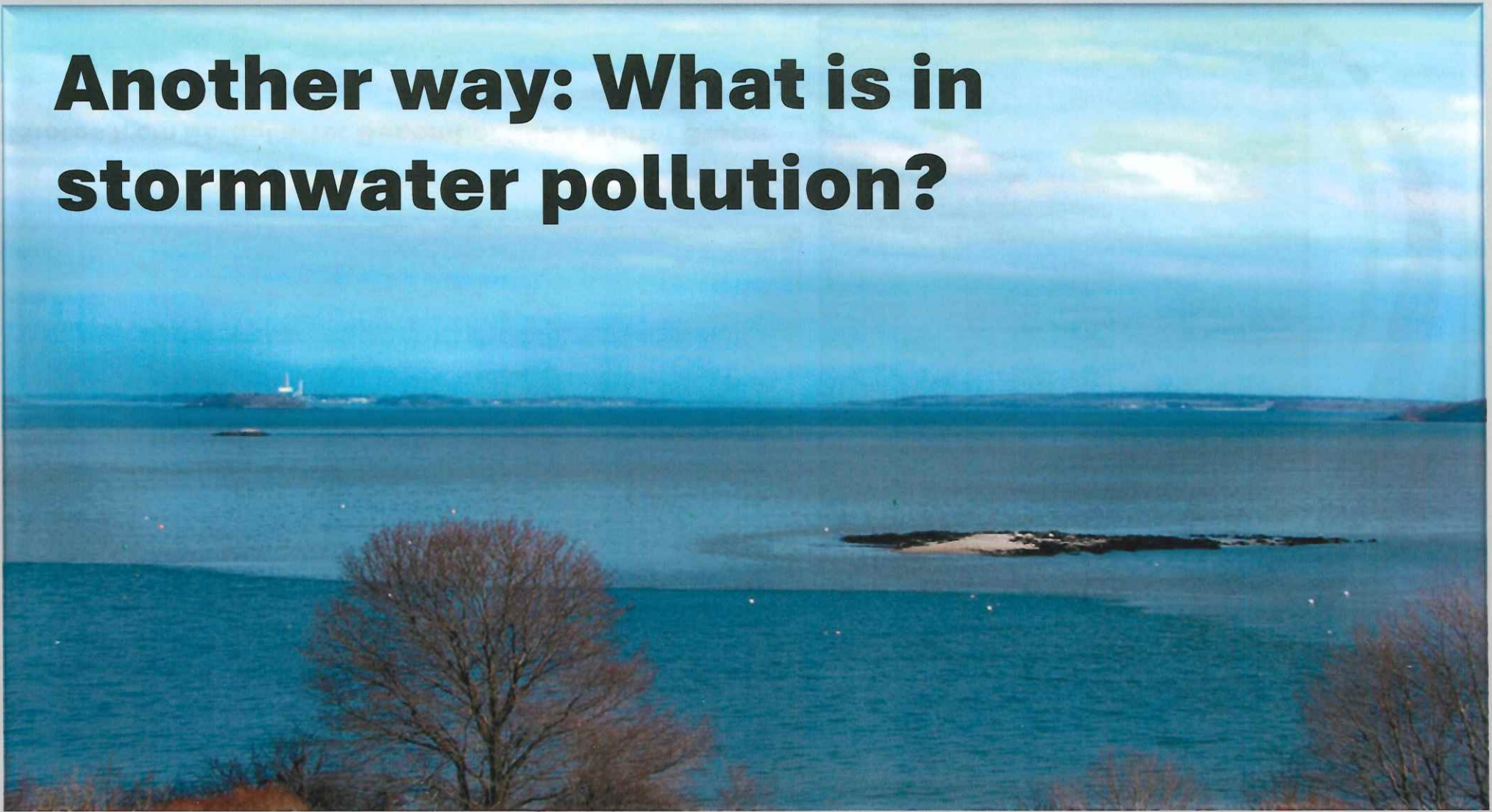
**One way to think about it:
Point and Non Point Source Stormwater Pollution**



→ part of what comm. is looking at
pt. source pollution

+ nonpt. source pollution → what sheets off

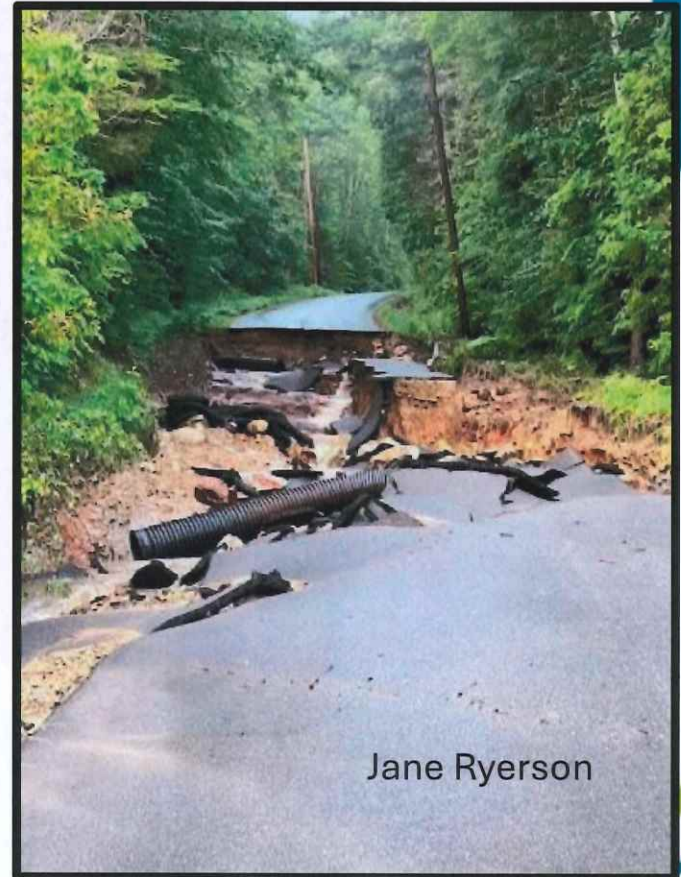
Another way: What is in stormwater pollution?



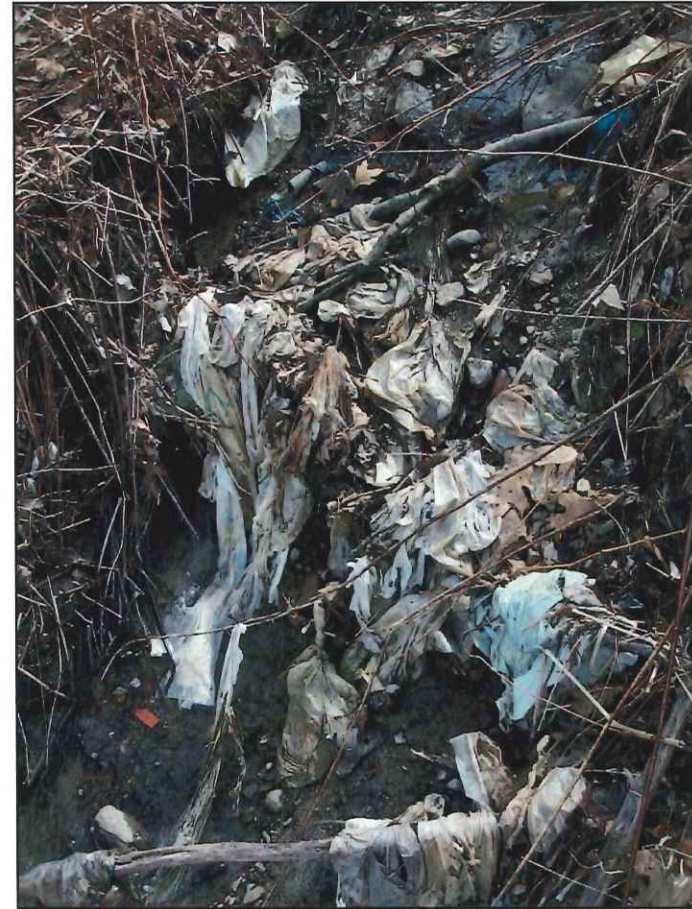


Jane Ryerson

Photos from Bethel after December 2023 Winter Storm



Jane Ryerson



Catch Basins: 824 Tons (Source: CSO Annual Report)
Street Sweeping: 2,666 Tons (Source: MS4 Annual Report)

↳ Maine MS4

Don't have data from non-MS4 communities

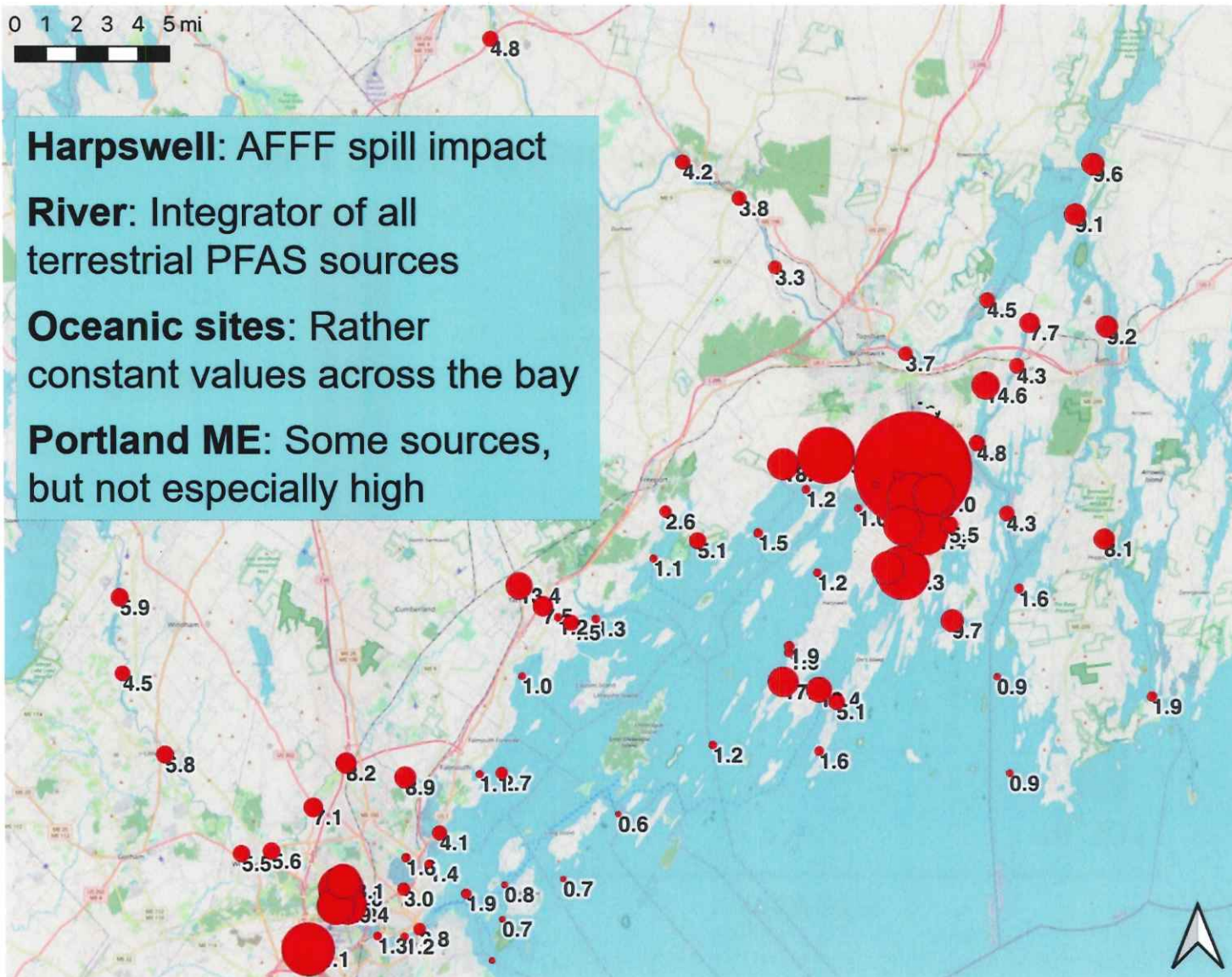




Data ~ 15 yrs old.

Bd. of Pesticides Ctrl. data





Results Overview

Sept 9-13, 2024
 Sum of 8 PFAS (ng/L)

Method EPA 1633
 Isotope dilution
 40 PFAS compounds
 Bigelow PFAS Facility
www.bigelow.org/pfas

Most 8 commonly detected
 PFOS, PFOA
 PFHxS
 PFHxA, PFHpA, PFNA
 FOSA, 6:2FTS

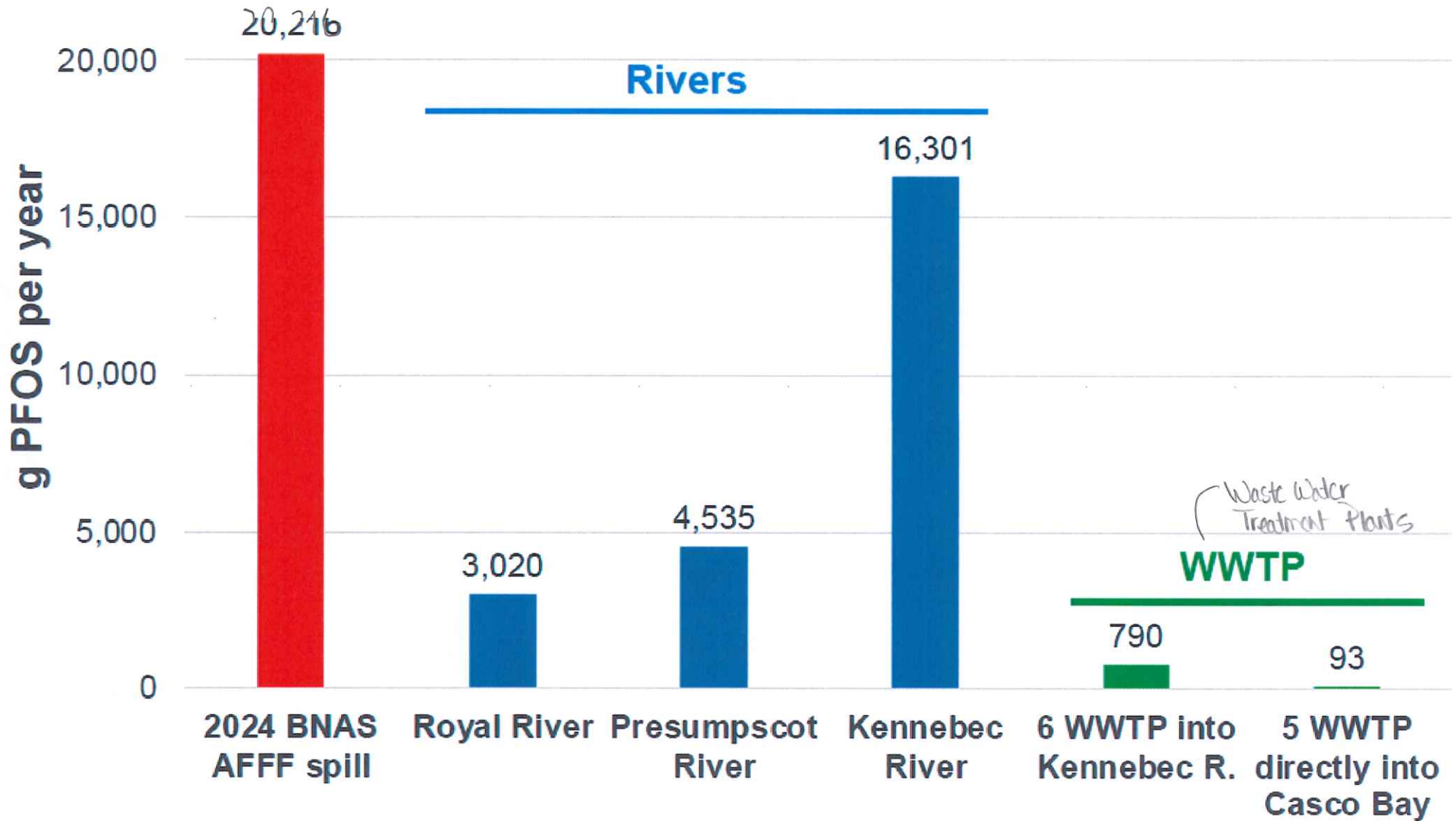
Branswick Naval Air Station => Super Fund site

Stormwater outfall

EPA methodology $\Rightarrow$ Collected water samples

DEP

Local shellfish mays



Bigelow Lab - Dr. Eplow (sp?)
Source of PFAS?

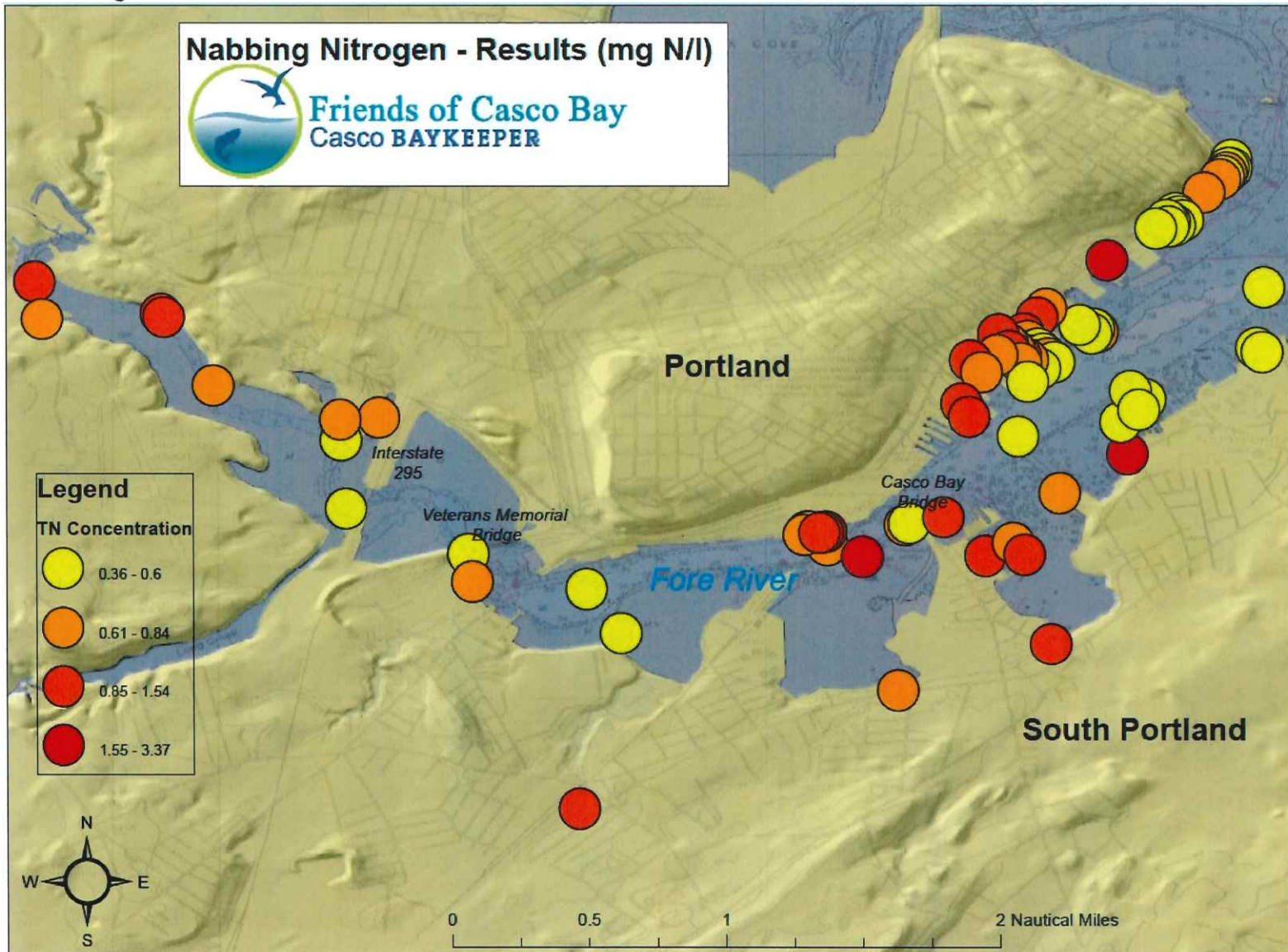
Nitrogen Loading -



Nabbing Nitrogen - Results (mg N/l)



Friends of Casco Bay
Casco BAYKEEPER



anything over
0.30
negatively
impacts
water quality

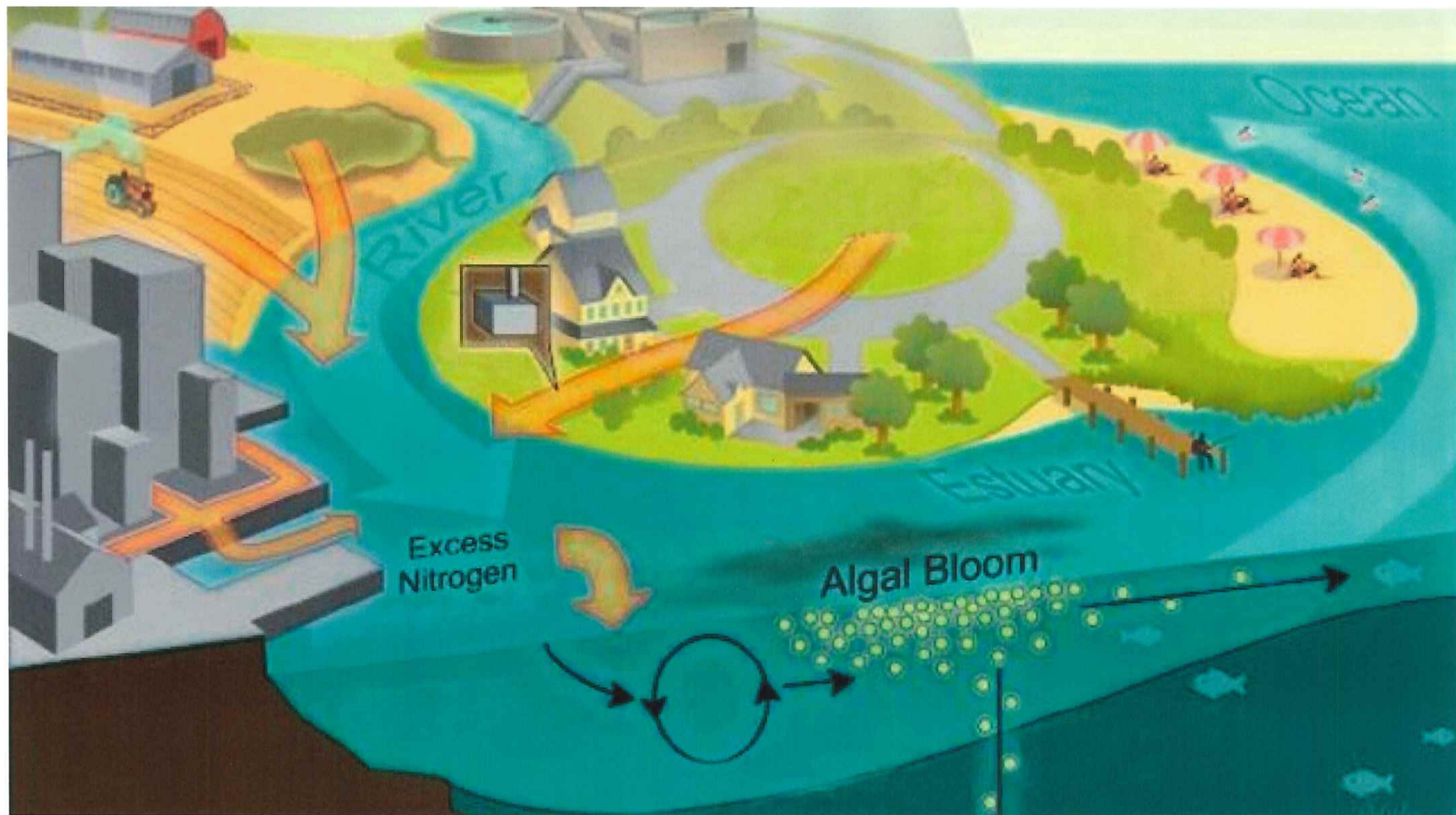




Want Sediment @
8.0

**Sediment pH 7.16
to 6.4 in a week**
makes the sediment acidic

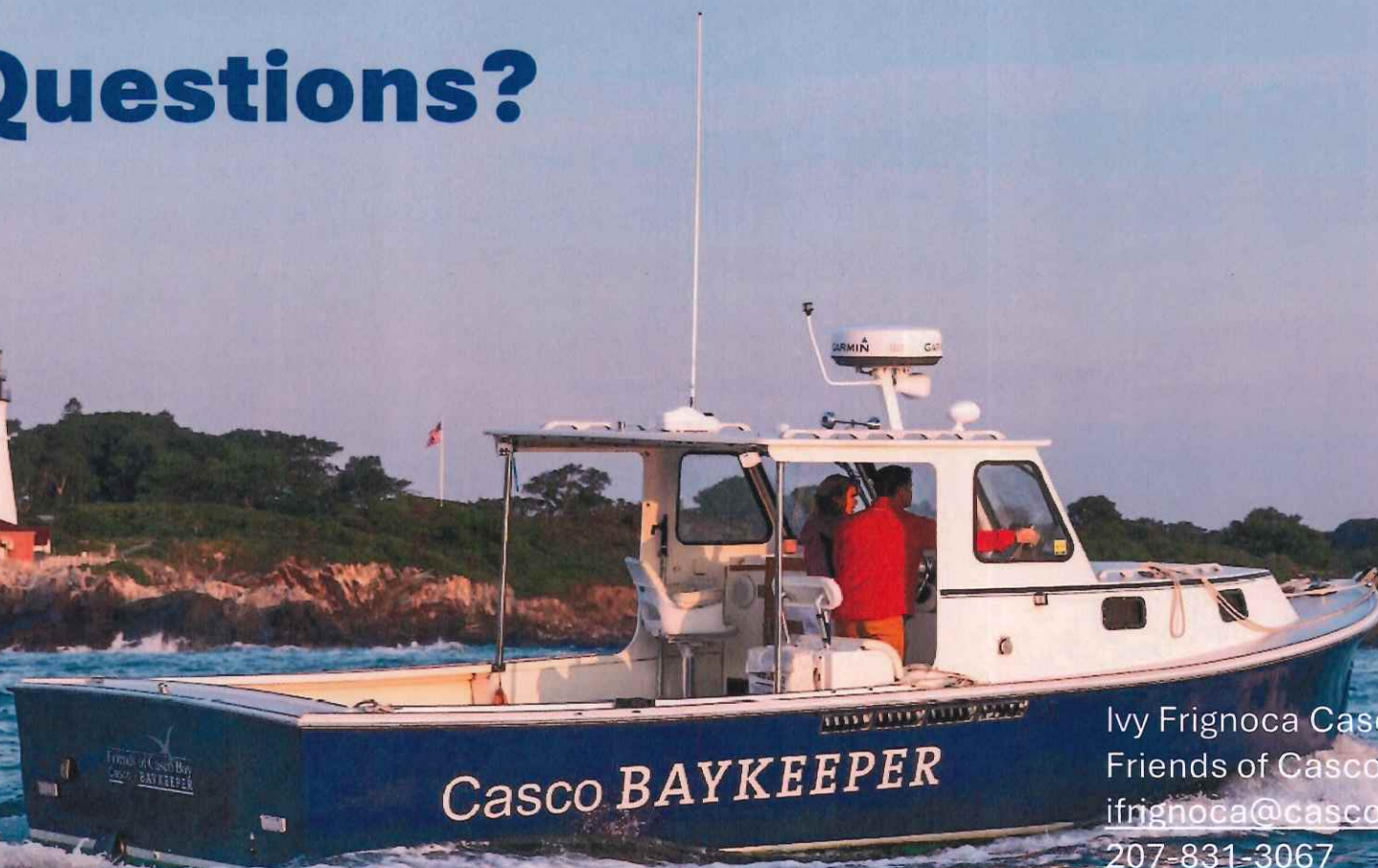






Friends of Casco Bay
Casco BAYKEEPER

Questions?



Ivy Frignoca Casco Baykeeper
Friends of Casco Bay
ifrignoca@cascobay.org
207-831-3067