

Data Final

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Leaflet works, epic

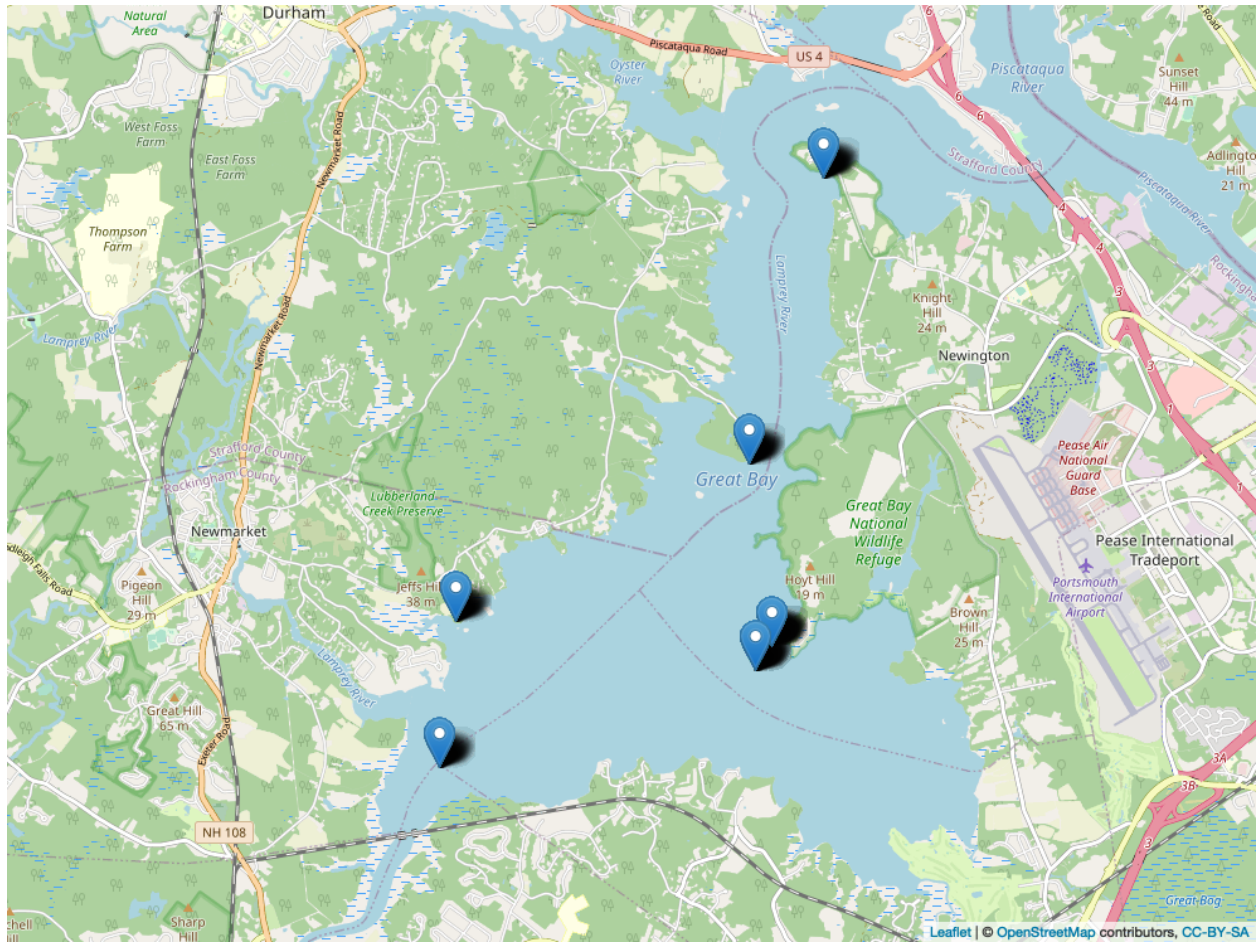
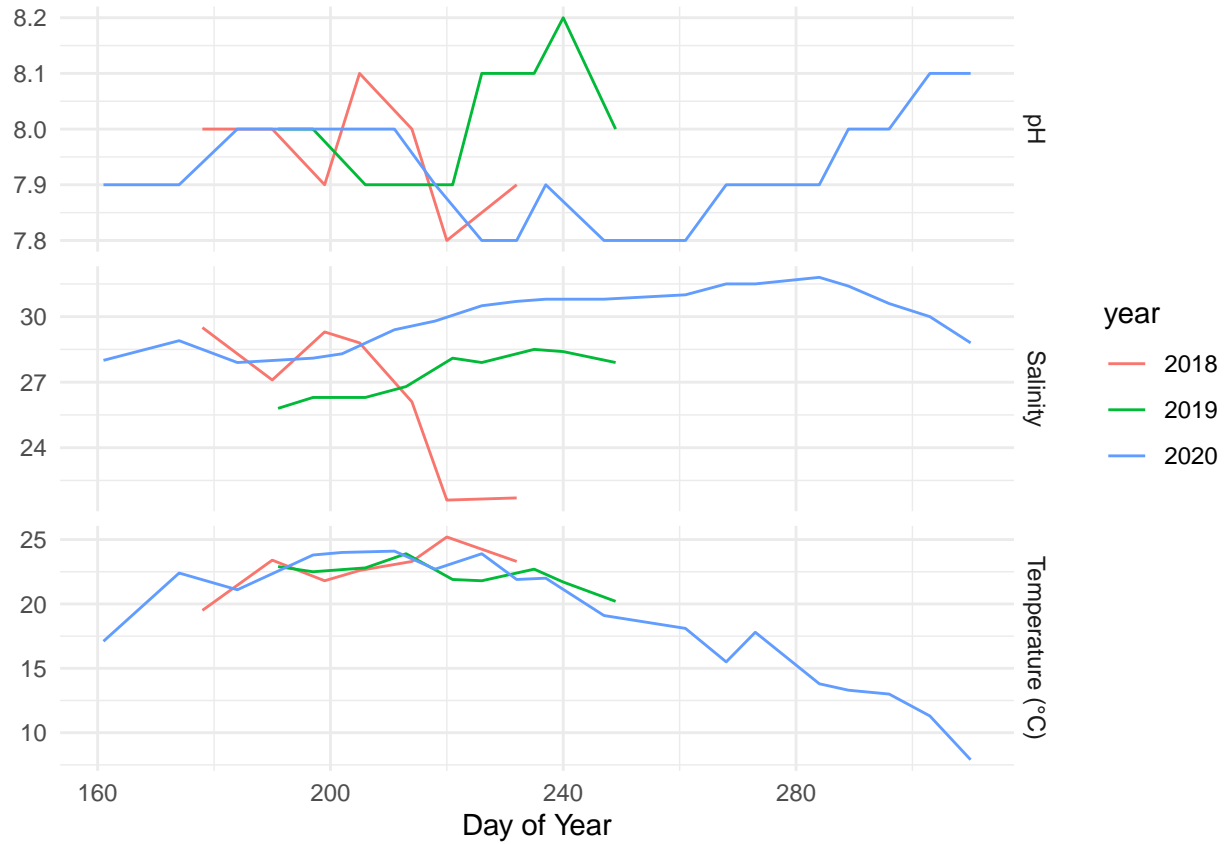


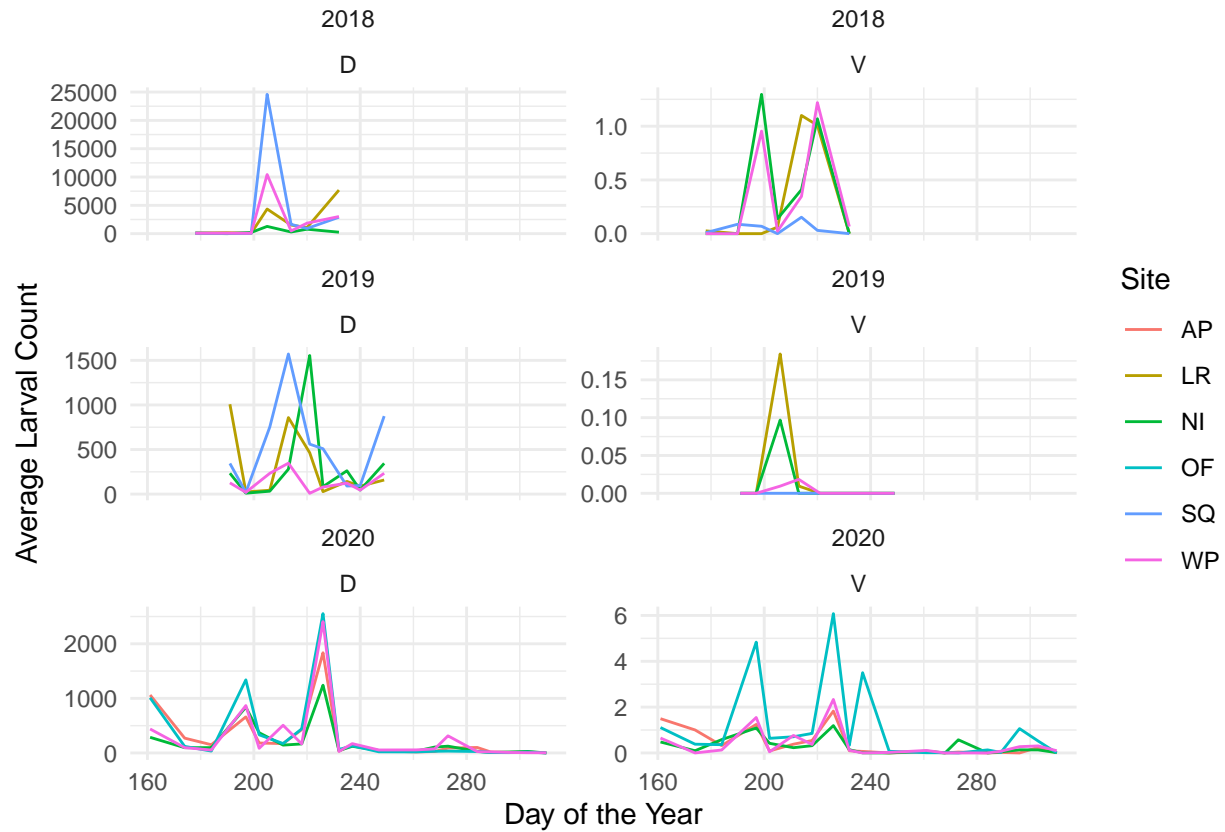
Figure 1: map of Great Bay area with markers for sampling sites

## physiochemical stuff



## larvae type across year and site

```
## # A tibble: 6 x 9
##   Date      Site Site_Lat Site_Long Temp  Sal  pH larvalType avgCount
##   <date>    <fct>   <dbl>   <dbl> <dbl> <dbl> <dbl> <chr>      <dbl>
## 1 2018-06-27 LR      43.1    -70.9  19.5  29.5   8 D      119.
## 2 2018-06-27 LR      43.1    -70.9  19.5  29.5   8 V      0.0262
## 3 2018-06-27 SQ      43.1    -70.9  19.5  29.5   8 D      85.6
## 4 2018-06-27 SQ      43.1    -70.9  19.5  29.5   8 V      0.00873
## 5 2018-06-27 NI      43.1    -70.9  19.5  29.5   8 D      94.3
## 6 2018-06-27 NI      43.1    -70.9  19.5  29.5   8 V      0
```

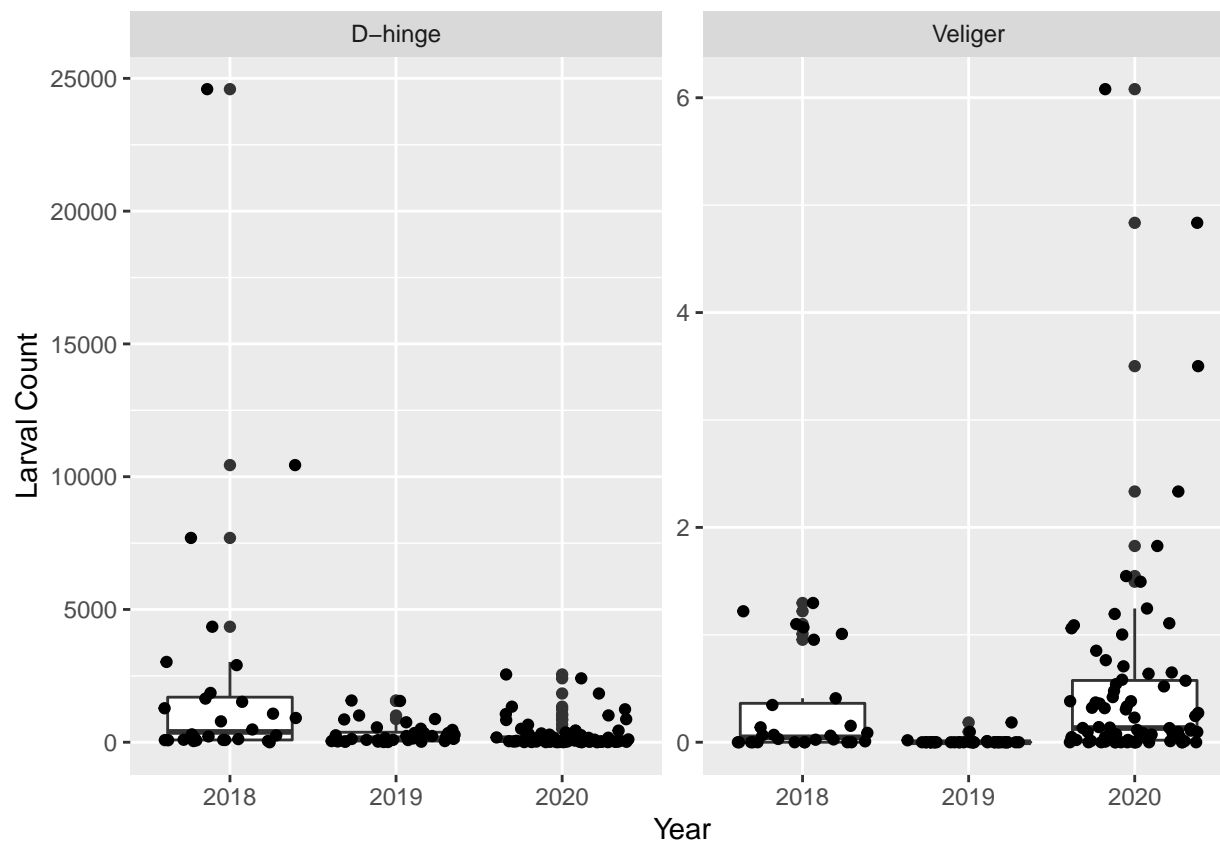


## 'summarise()' has grouped output by 'year'. You can override using the  
## '.groups' argument.

larvalType	2018	2019	2020
D-hinge	2293	325	273
Veliger	0.29	0.0088	0.53

## 'summarise()' has grouped output by 'year', 'larvalType'. You can override  
## using the '.groups' argument.

larvalType	Site	2018	2019	2020
<b>D-hinge</b>				
D-hinge	LR	2144	313	NA
D-hinge	NI	419	316	200
D-hinge	SQ	4319	535	NA
D-hinge	WP	2291	135	283
D-hinge	AP	NA	NA	277
D-hinge	OF	NA	NA	334
<b>Veliger</b>				
Veliger	LR	0.31	0.022	NA
Veliger	NI	0.42	0.011	0.29
Veliger	SQ	0.05	0	NA
Veliger	WP	0.37	0.0031	0.36
Veliger	AP	NA	NA	0.39
Veliger	OF	NA	NA	1.1



## ANOVA stuff

```
##           Df    Sum Sq Mean Sq F value   Pr(>F)
## year         2  89956271 44978136    8.802 0.000258 ***
## Site         5  25737592  5147518    1.007 0.416065
## Residuals   132 674555335  5110268
## ---
## Signif. codes:  0 '***' 0.001 '**' 0.01 '*' 0.05 '.' 0.1 ' ' 1
```

term	df	sumsq	meansq	statistic	p.value
year	2	89956271	44978136	8.801522	0.0002581
Site	5	25737592	5147518	1.007289	0.4160648
Residuals	132	674555335	5110268	NA	NA

```
##           Df Sum Sq Mean Sq F value   Pr(>F)
## year         2   6.81   3.403   5.983 0.00326 **
## Site         5   8.09   1.619   2.847 0.01786 *
## Residuals   132  75.08   0.569
## ---
## Signif. codes:  0 '***' 0.001 '**' 0.01 '*' 0.05 '.' 0.1 ' ' 1
```

term	df	sumsq	meansq	statistic	p.value
year	2	6.806097	3.4030483	5.983259	0.0032555
Site	5	8.094962	1.6189925	2.846522	0.0178619
Residuals	132	75.076544	0.5687617	NA	NA

term	estimate	std.error	statistic	p.value
(Intercept)	-1280.34280	1001.7611	-1.278092	0.2033626
Temp	96.84751	48.2386	2.007677	0.0466301

term	estimate	std.error	statistic	p.value
(Intercept)	5168.0288	2413.1868	2.141578	0.0339838
Sal	-156.7242	84.1801	-1.861772	0.0647622

term	estimate	std.error	statistic	p.value
(Intercept)	-16954.08	16123.834	-1.051492	0.2948704
pH	2217.47	2026.177	1.094411	0.2756813

term	estimate	std.error	statistic	p.value
(Intercept)	-0.3857221	0.3369430	-1.144769	0.2542863
Temp	0.0360793	0.0162251	2.223671	0.0277961

term	estimate	std.error	statistic	p.value
(Intercept)	0.0061674	0.8239285	0.0074854	0.9940384
Sal	0.0119843	0.0287414	0.4169704	0.6773479

term	estimate	std.error	statistic	p.value
(Intercept)	13.834493	5.342270	2.589628	0.0106384
pH	-1.694823	0.671328	-2.524583	0.0127155