

Are assessed stocks a representative sample of fished species in the US?

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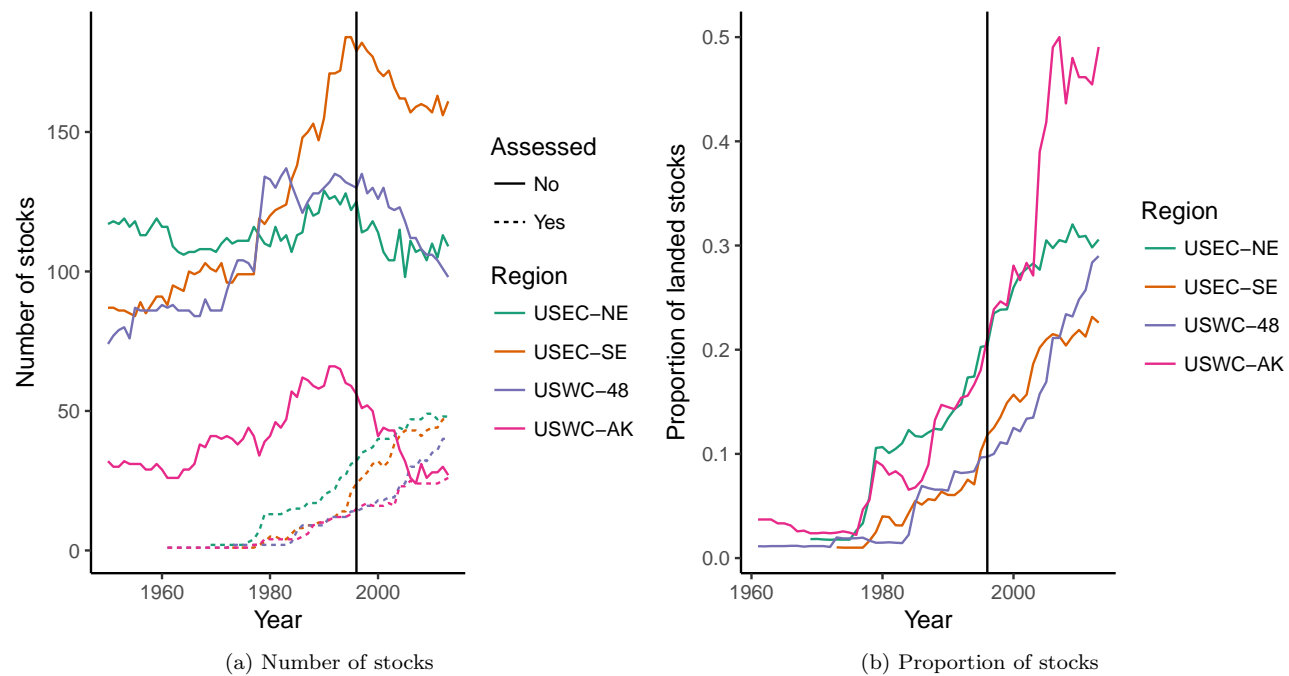


Figure 1: Timeline of a) the number of stocks landed by region and assessment status and b) proportion of landed stocks that are assessed. The vertical line marks the enactment of the Sustainable Fisheries Act of 1996

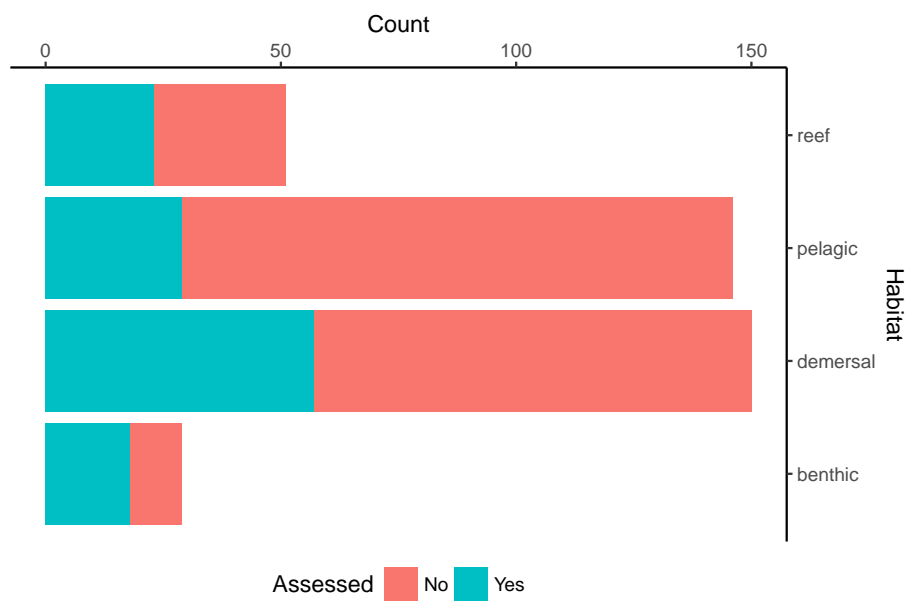


Figure 2: Assessment status at time of last known status (censoring time) by habitat

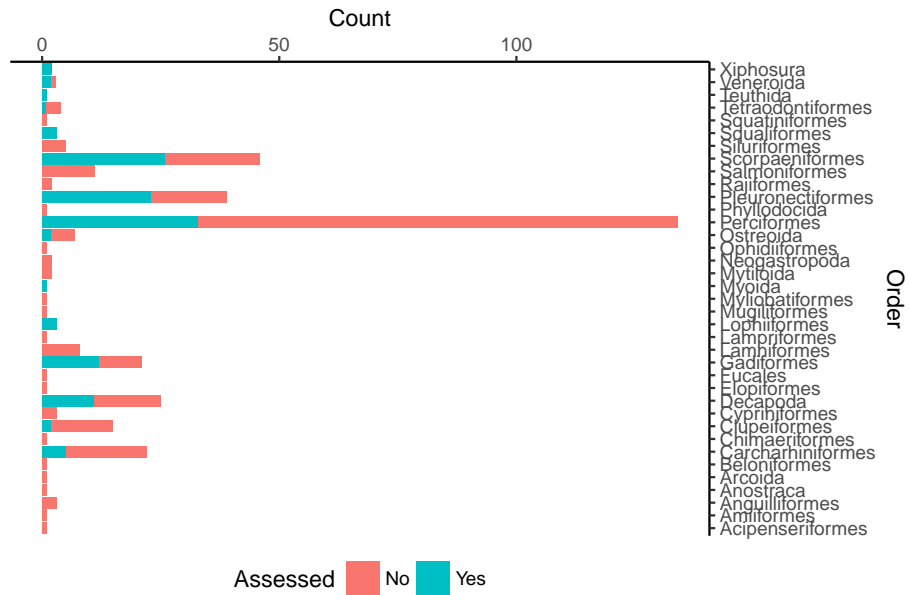


Figure 3: Assessment status at time of last known status (censoring time) by phylum

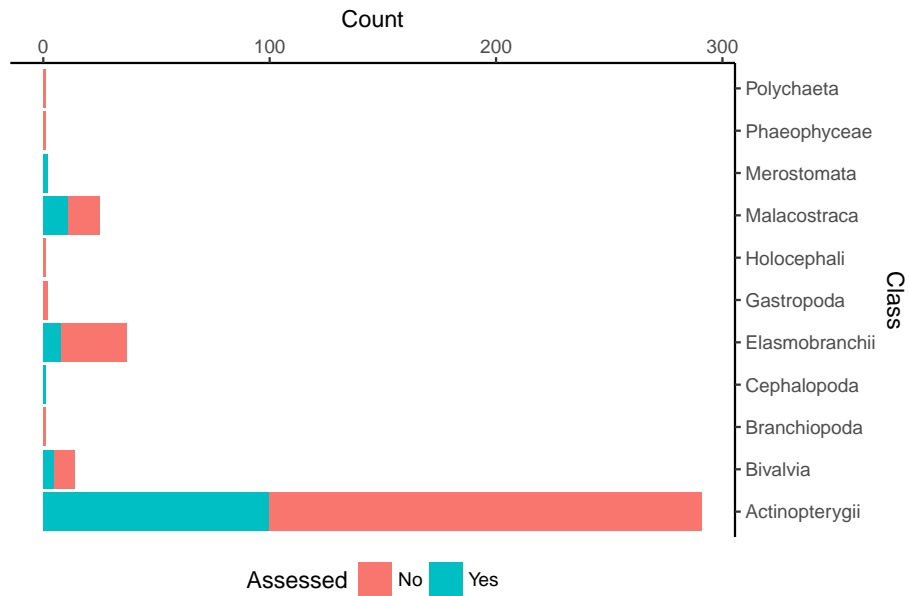


Figure 4: Assessment status at time of last known status (censoring time) by Class

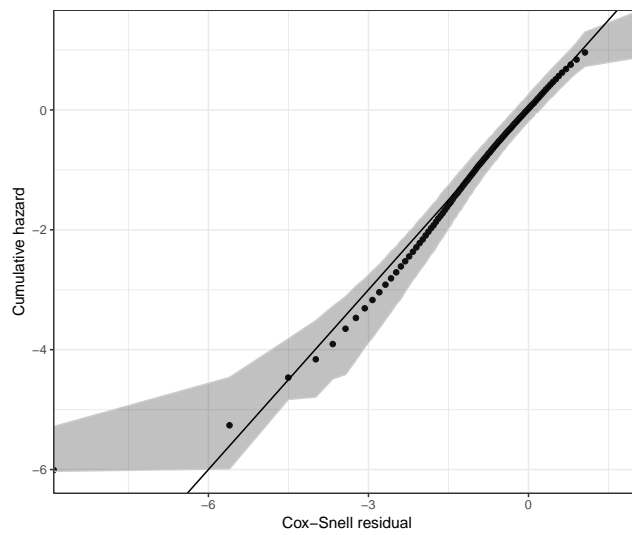


Figure 5: Model fit of the Weibull survival model

```

# finite population variance of habitat effect
get_coef_chains(model.out = a.out, coef.names = "fp.sd.hab") %>% summarise(mean(MCMC)^2)

##    mean(MCMC)^2
## 1      2.434646

# finite population variance of phylum effect
get_coef_chains(model.out = a.out, coef.names = "fp.sd.family") %>% summarise(mean(MCMC)^2)

##    mean(MCMC)^2
## 1      1.971056

get_coef_chains(model.out = a.out, coef.names = "fp.sd.order") %>% summarise(mean(MCMC)^2)

##    mean(MCMC)^2
## 1      83.61414

get_coef_chains(model.out = a.out, coef.names = "fp.sd.class") %>% summarise(mean(MCMC)^2)

##    mean(MCMC)^2
## 1      1.024686

```

Table 1: Posterior mean and $P(\beta > 1)$ for model parameters

Parameter	Posterior Mean	Bayesian P
X.Intercept.	-13.79	0.00
regionUSEC.SE	-0.23	0.23
regionUSWC.48	-0.35	0.11
regionUSWC.AK	-2.67	0.00
land	3.01	1.00
price	-0.68	0.01

Table 2: Posterior mean and $P(\beta > 1)$ for habitat effect

Habitat	Posterior Mean	Bayesian P
benthic	1.62	0.84
demersal	-1.58	0.19
pelagic	-1.66	0.17
reef	-0.57	0.51