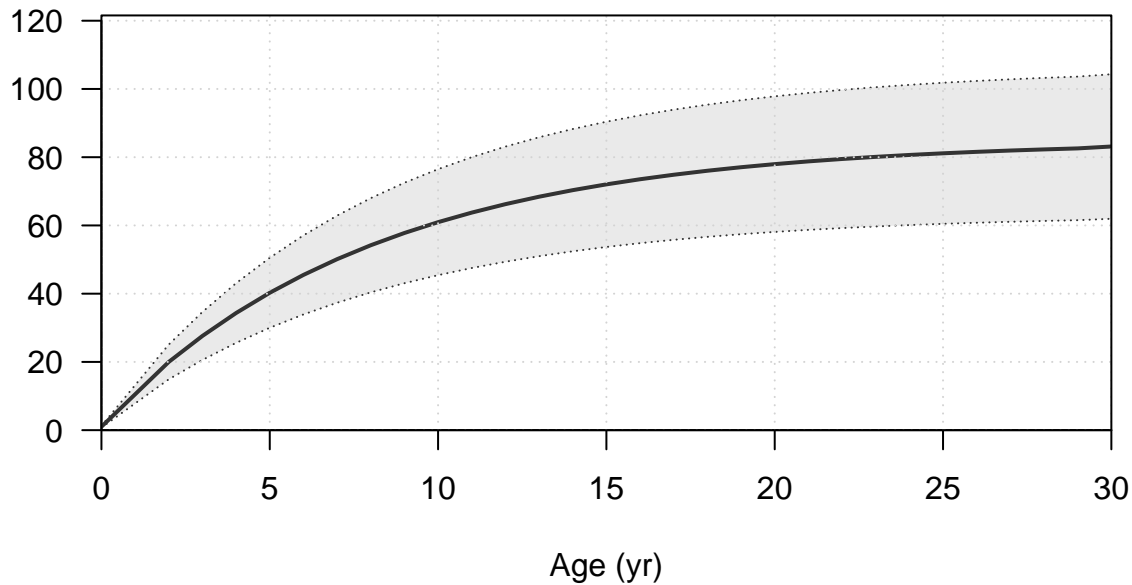
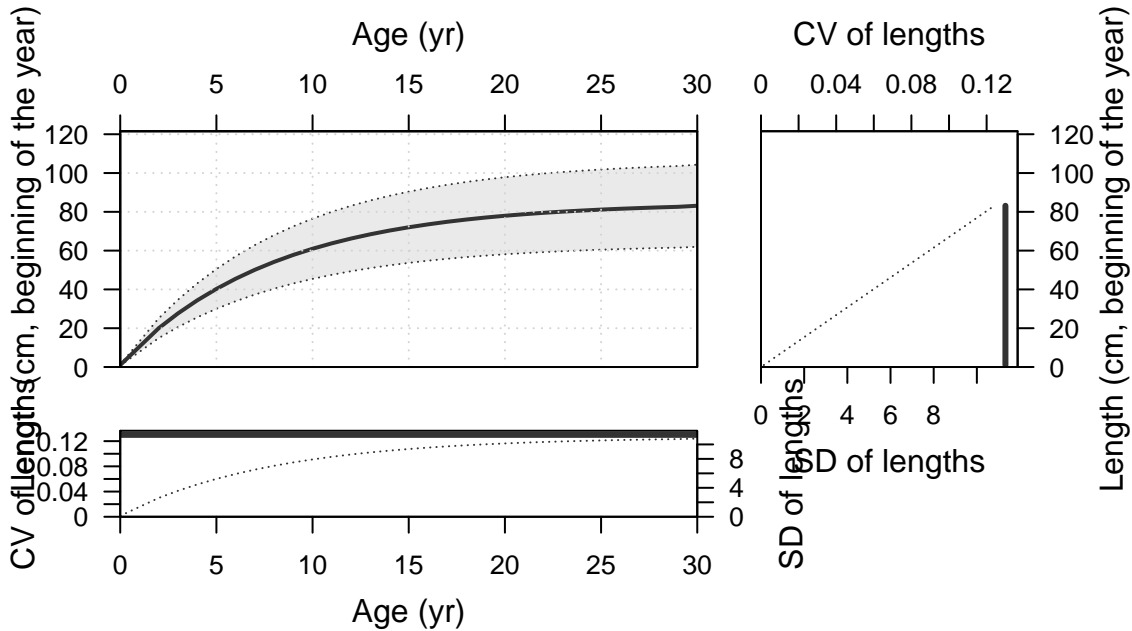
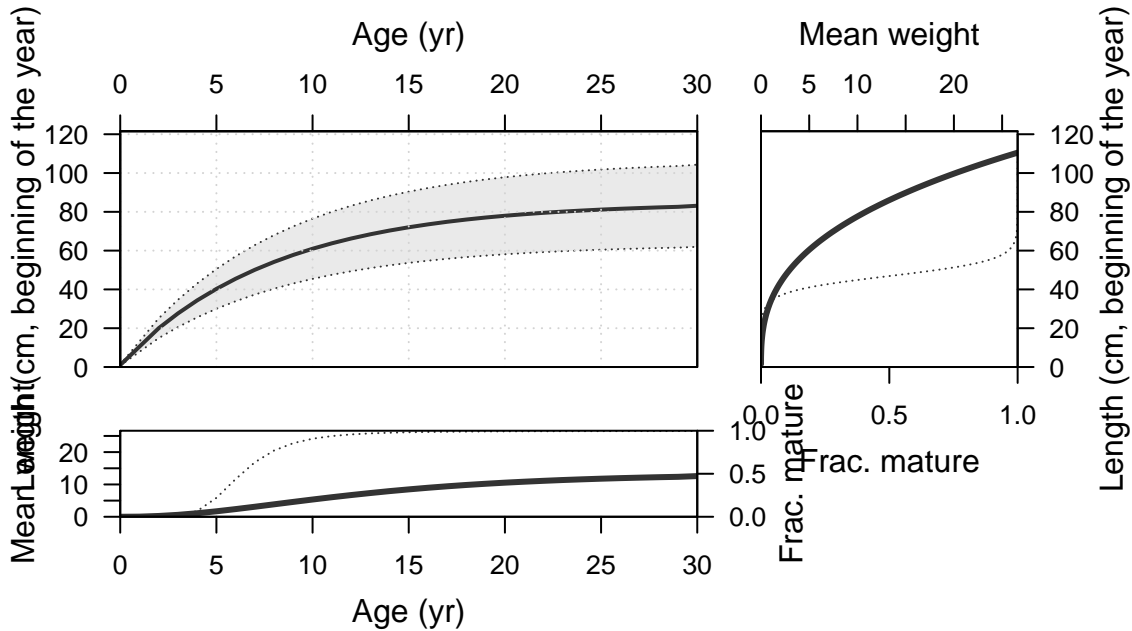


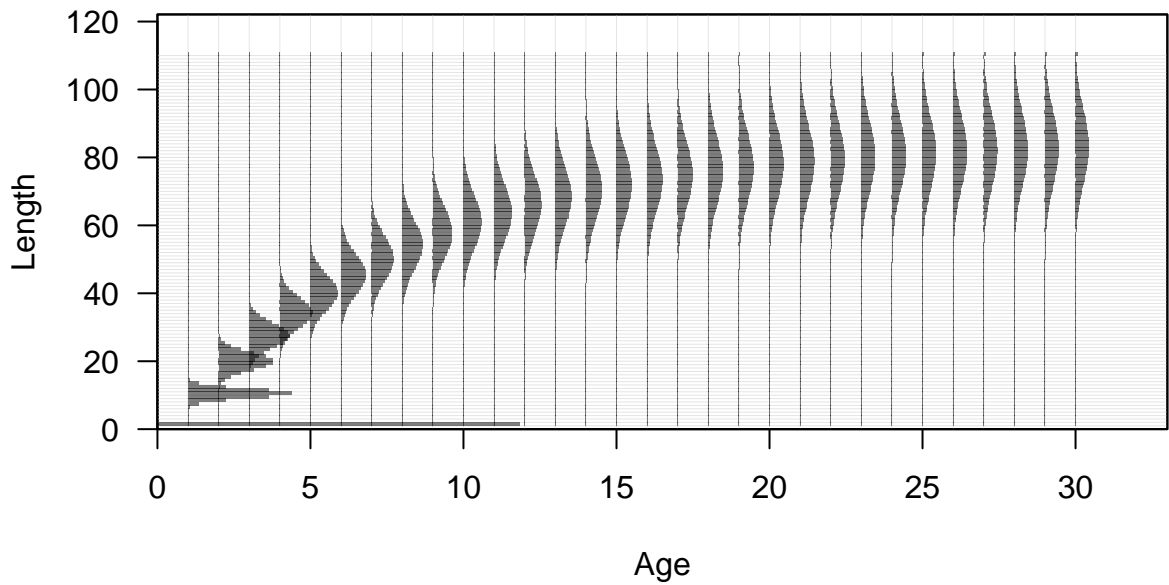
Plots created using the 'r4ss' package in R
Stock Synthesis version: 3.30.19.0
StartTime: Thu Jun 30 11:02:16 2022
Data_File: data.ss
Control_File: control.ss

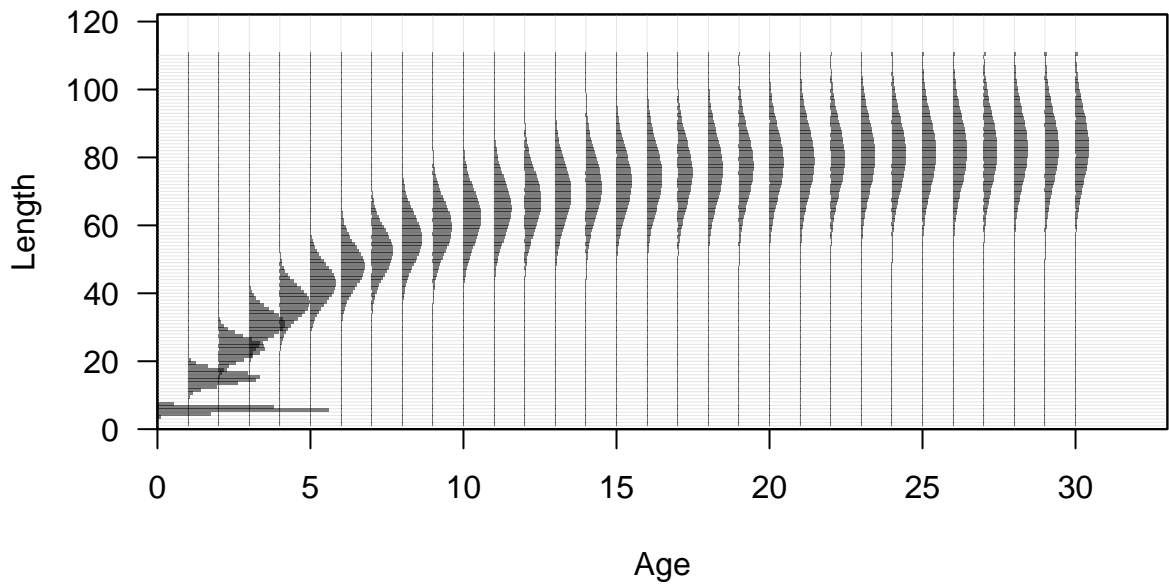
Length (cm, beginning of the year)



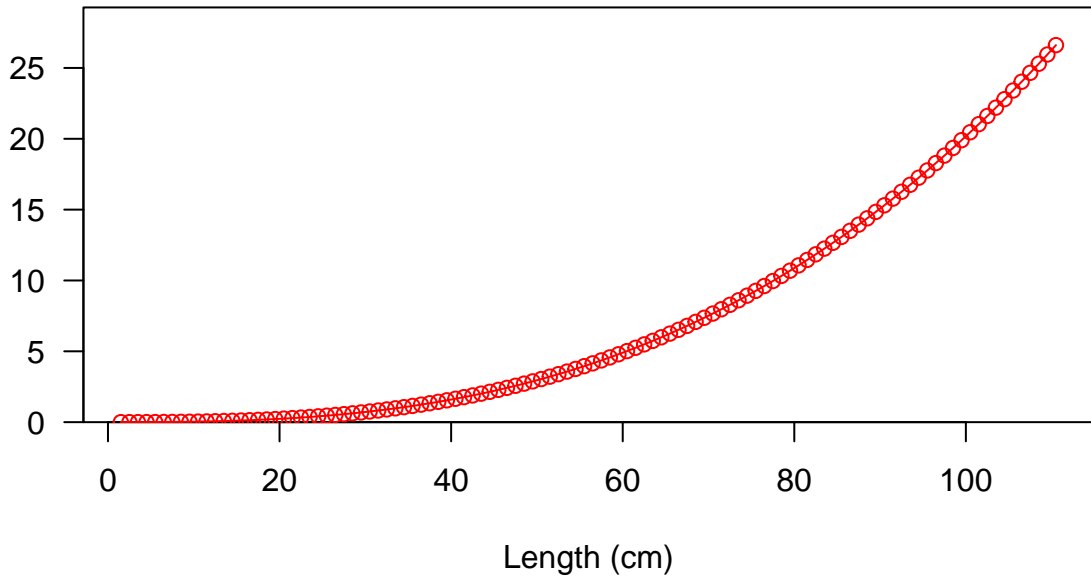


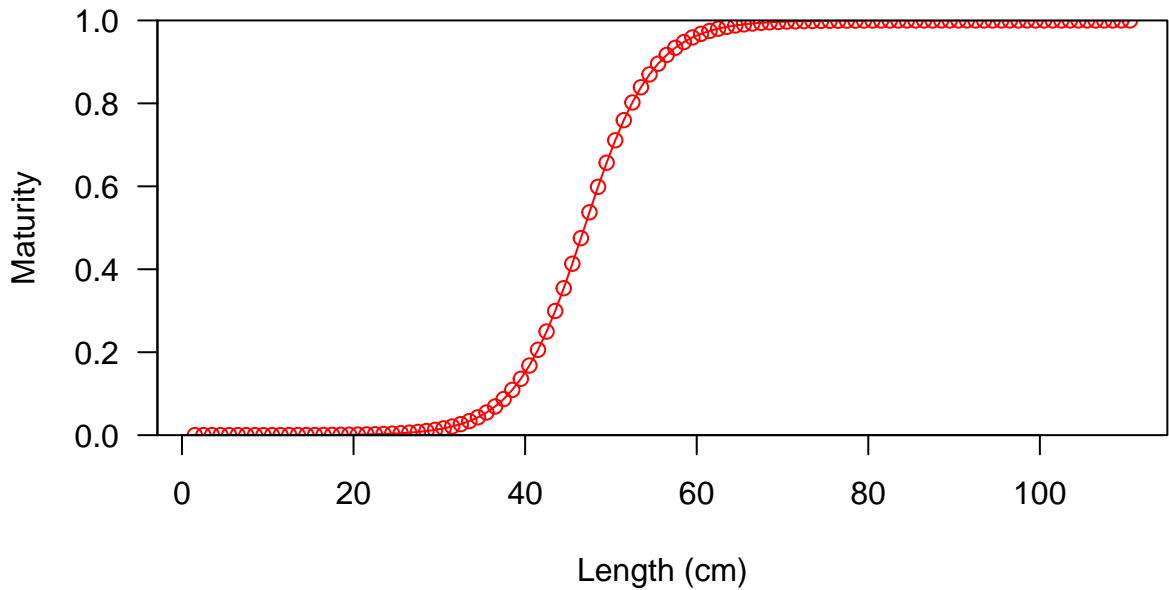


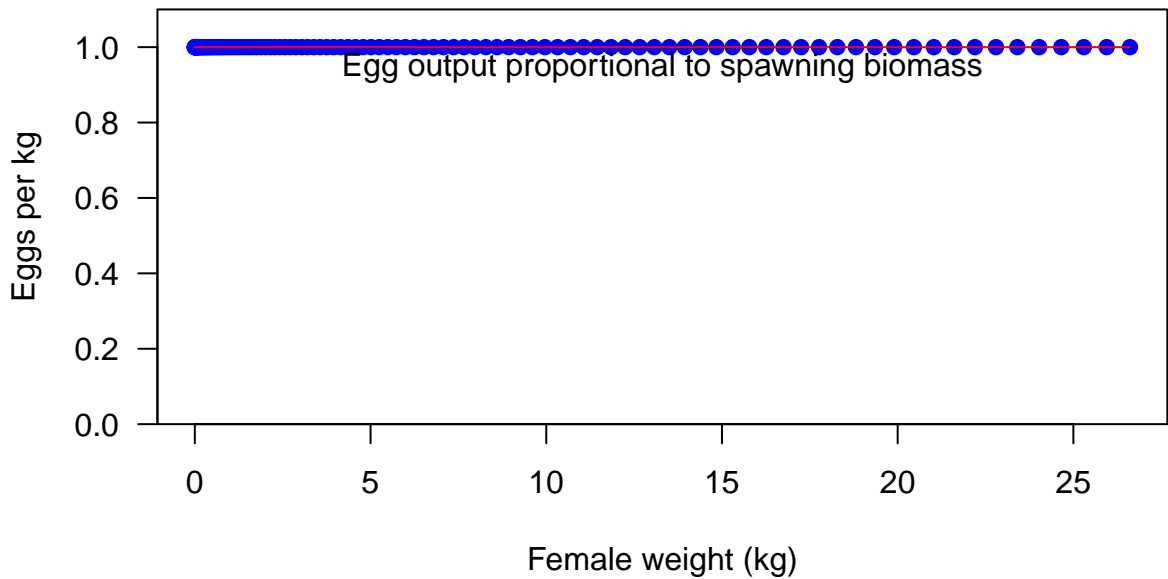


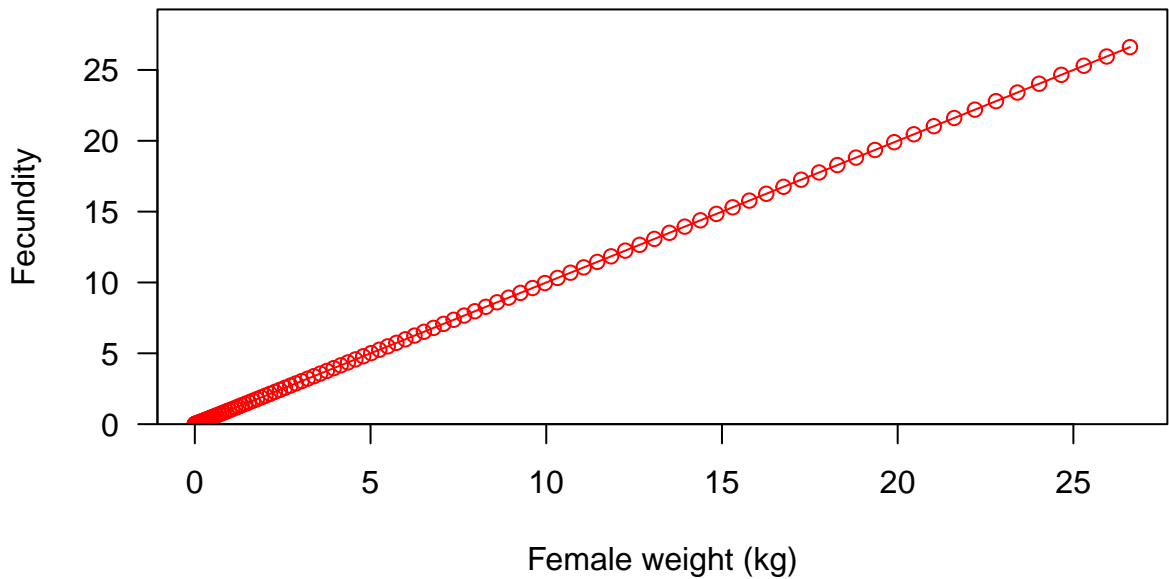


Mean weight (kg) in last year

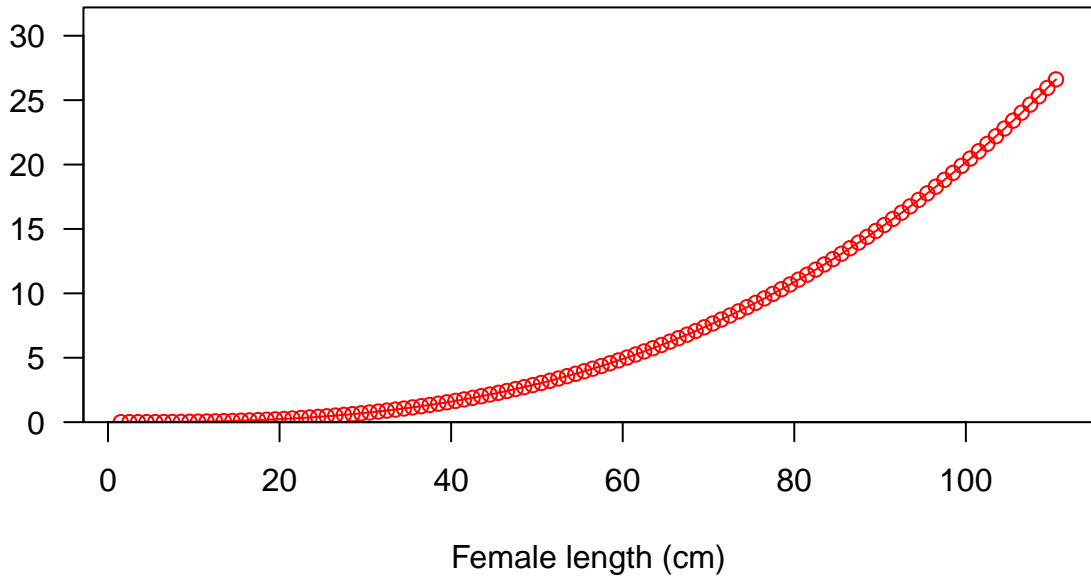








Fecundity



Spawning output

25
20
15
10
5
0

0

20

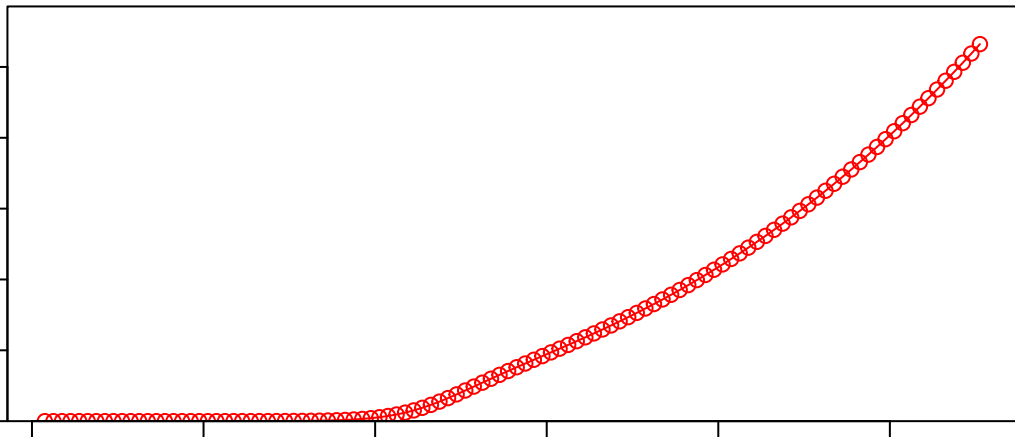
40

60

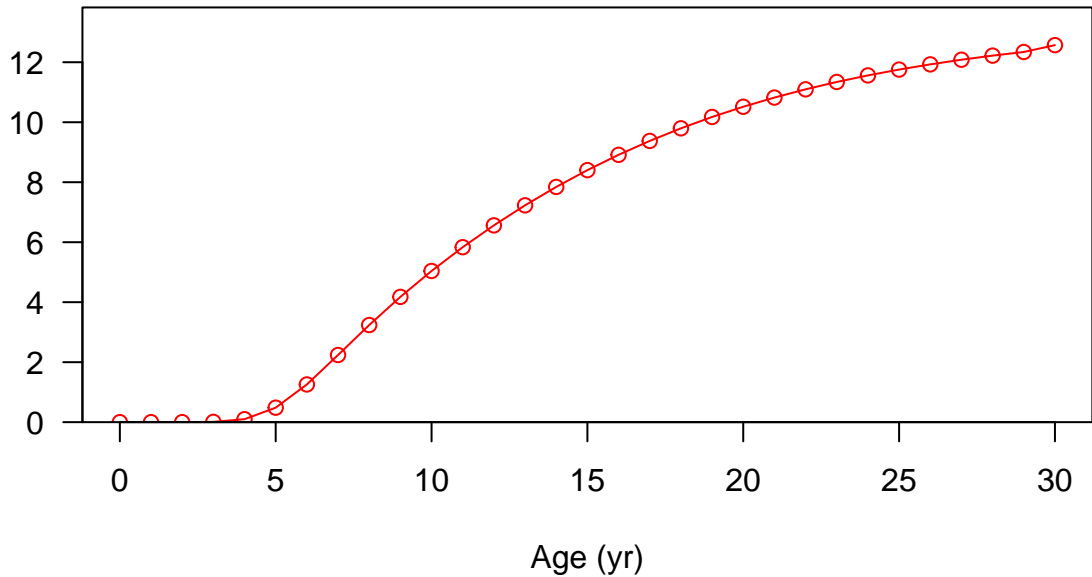
80

100

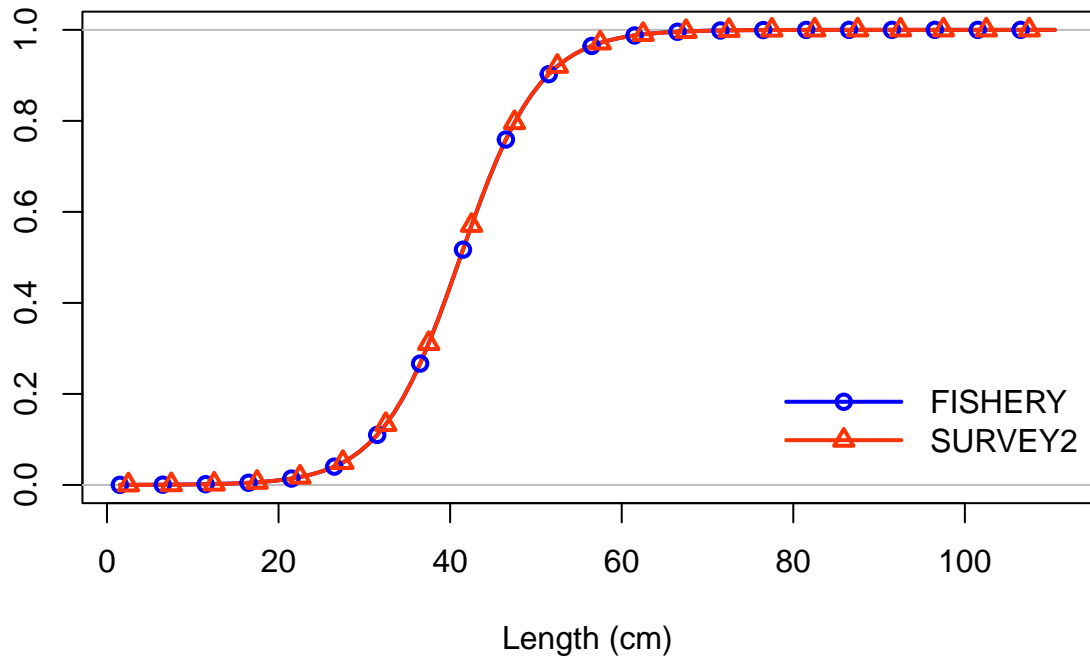
Length (cm)



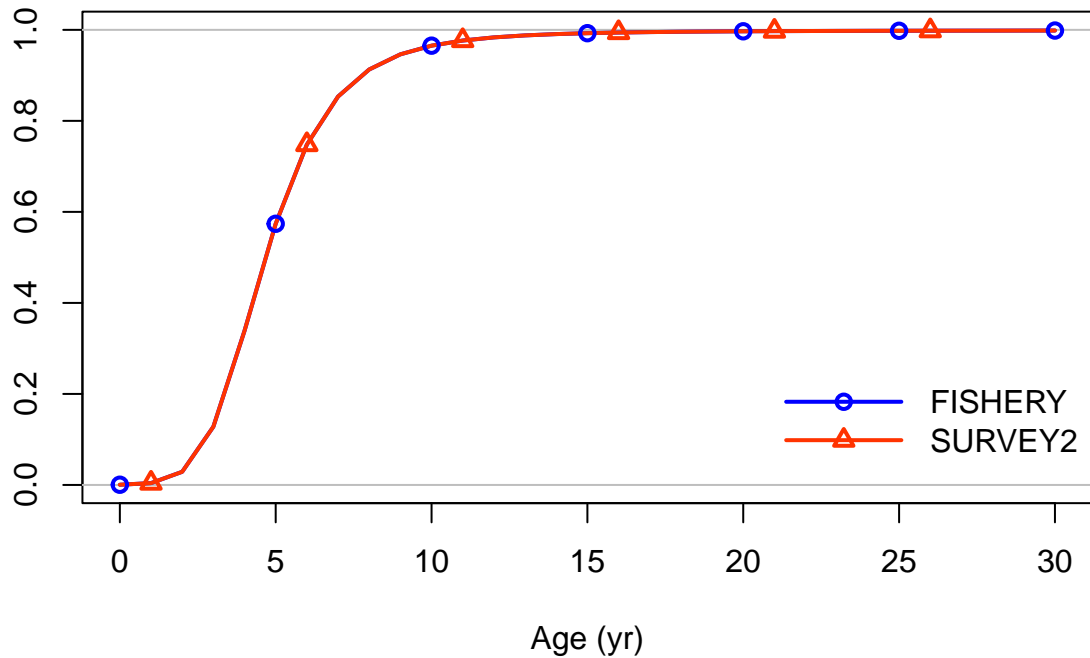
Spawning output



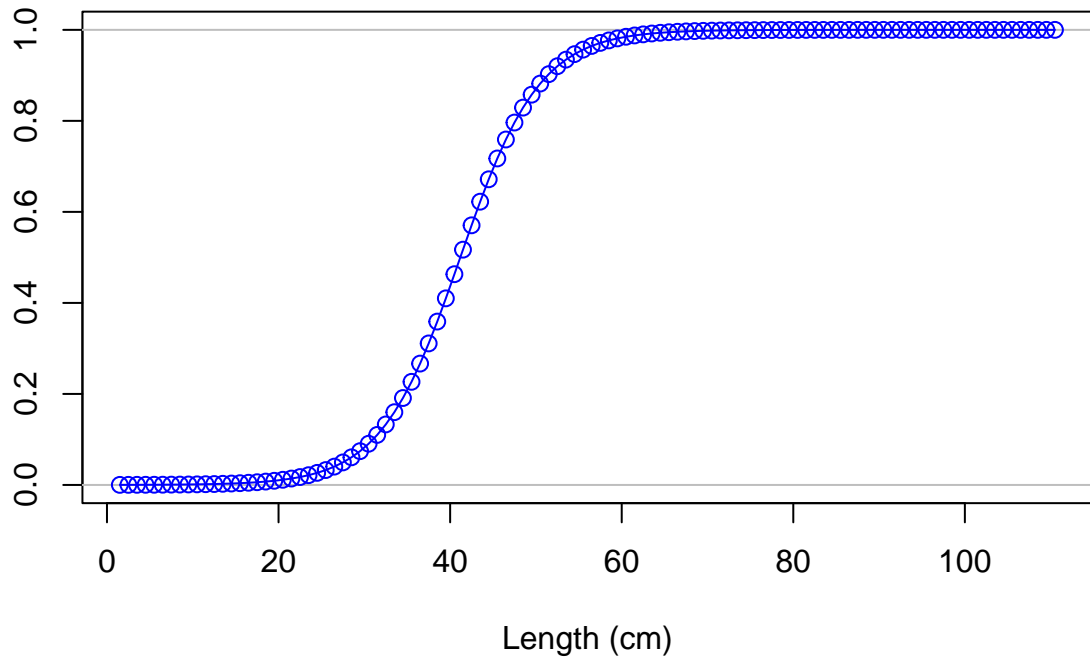
Selectivity



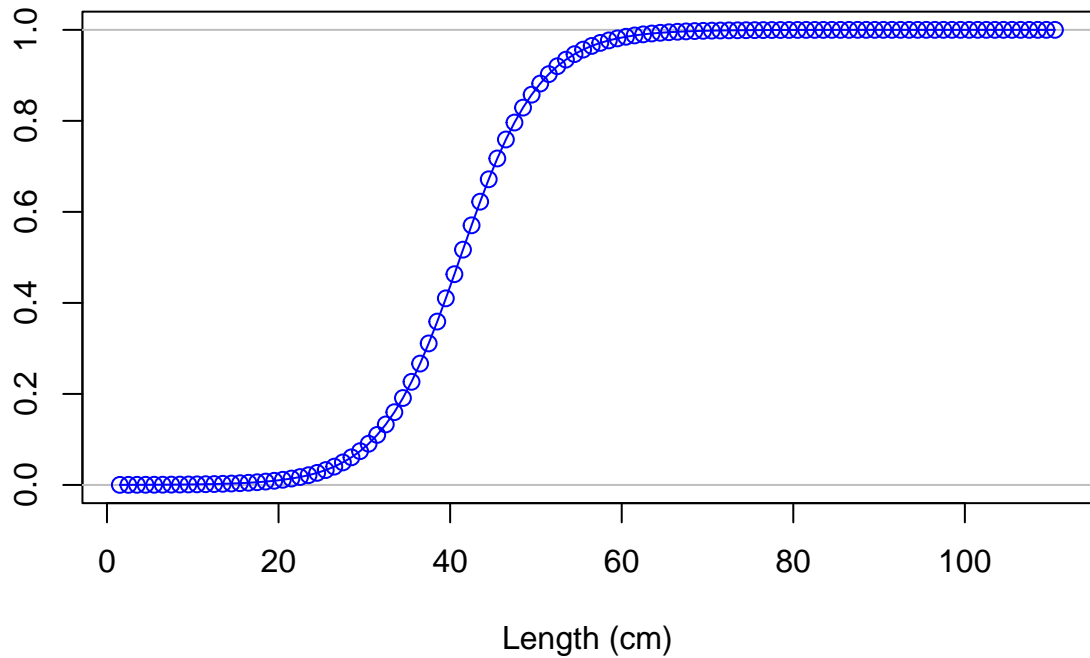
Selectivity

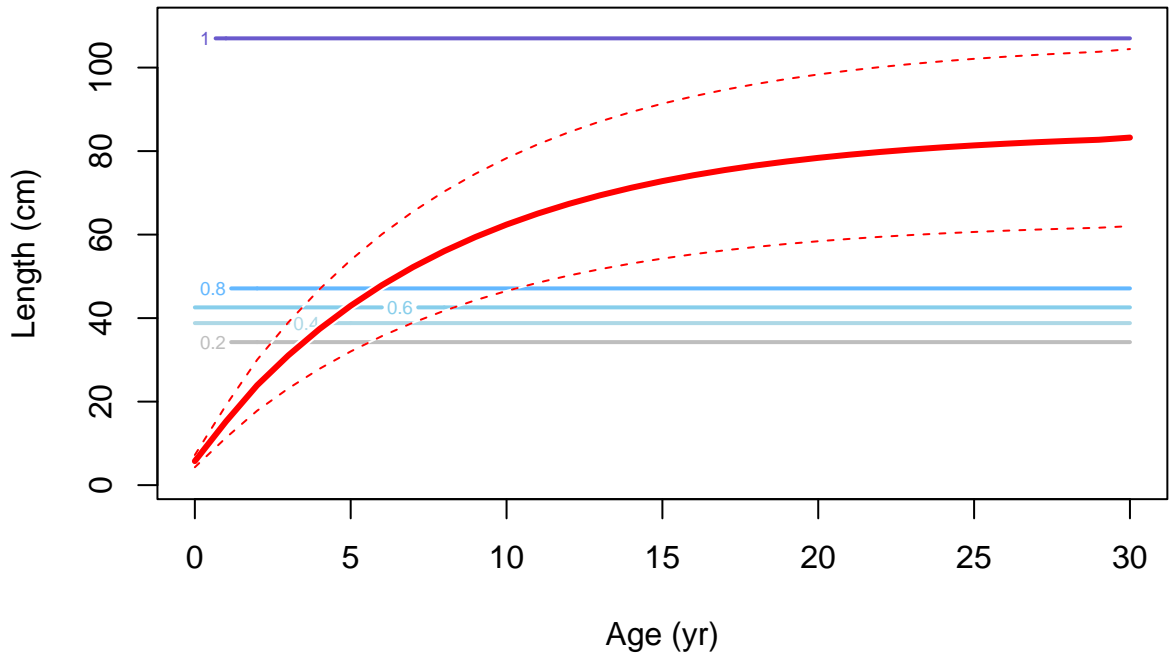


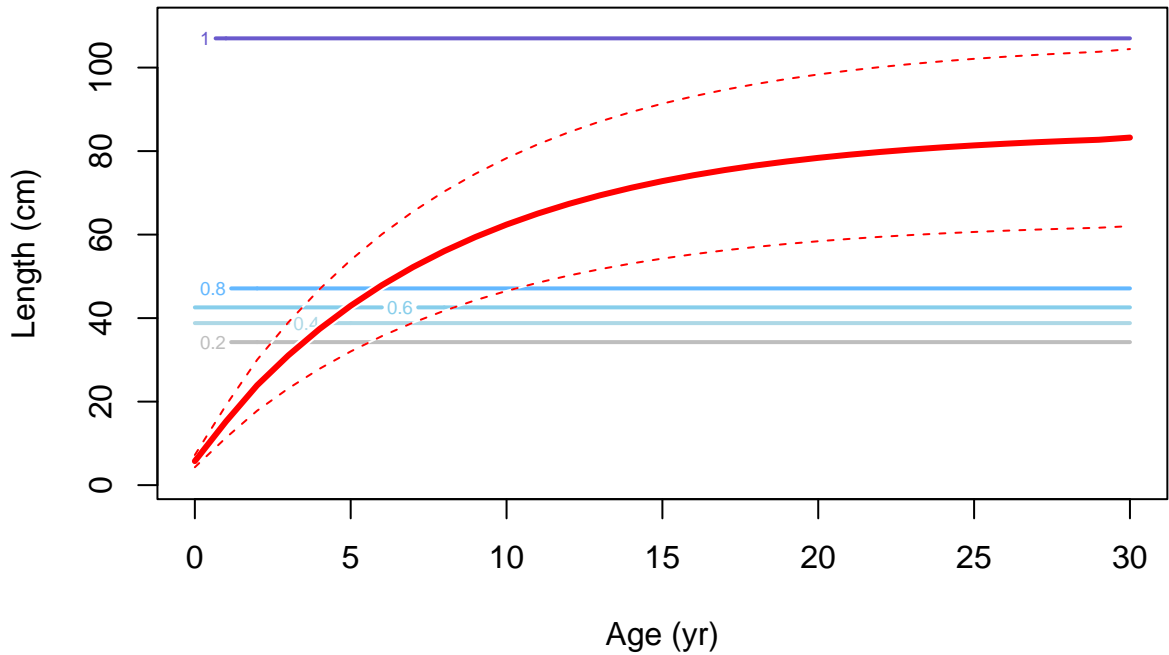
Selectivity

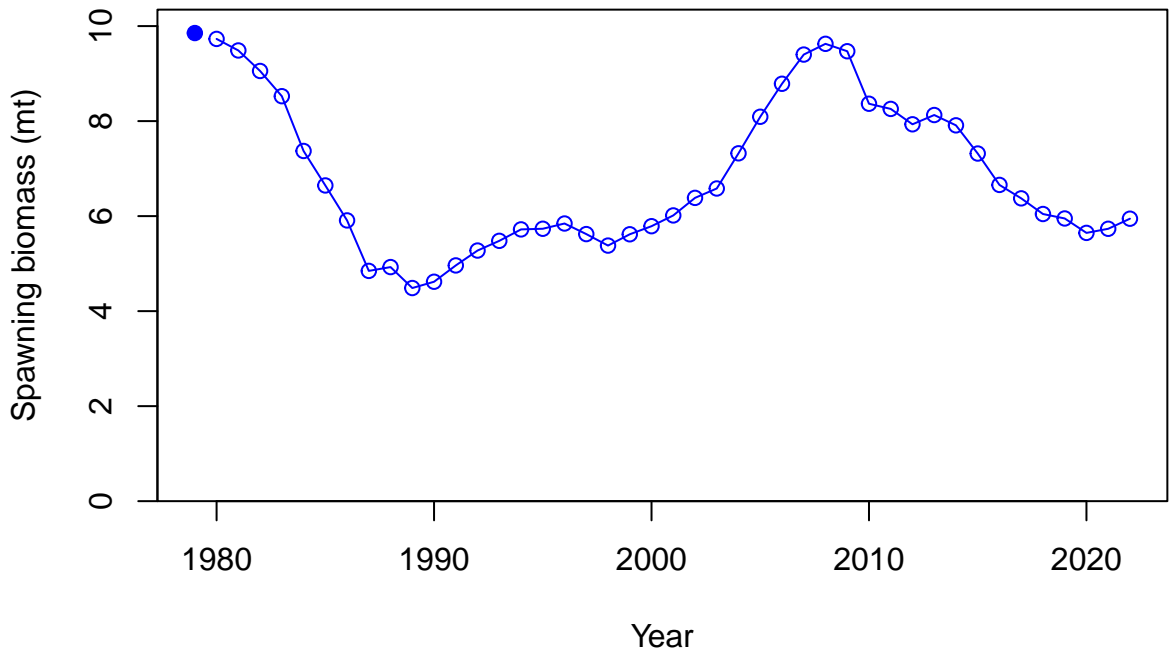


Selectivity

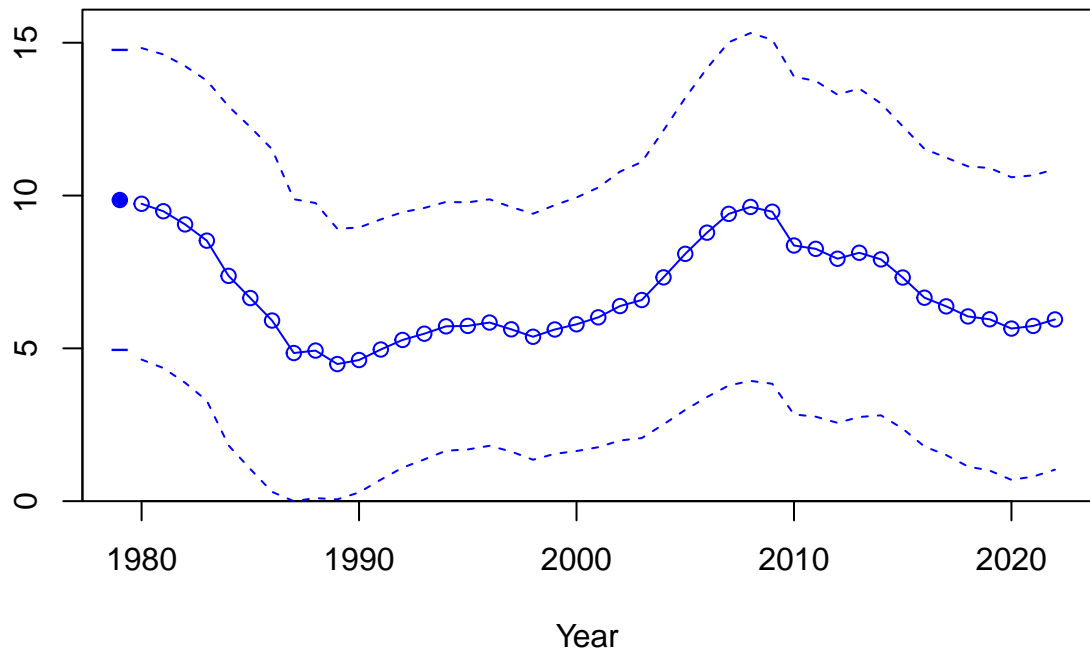




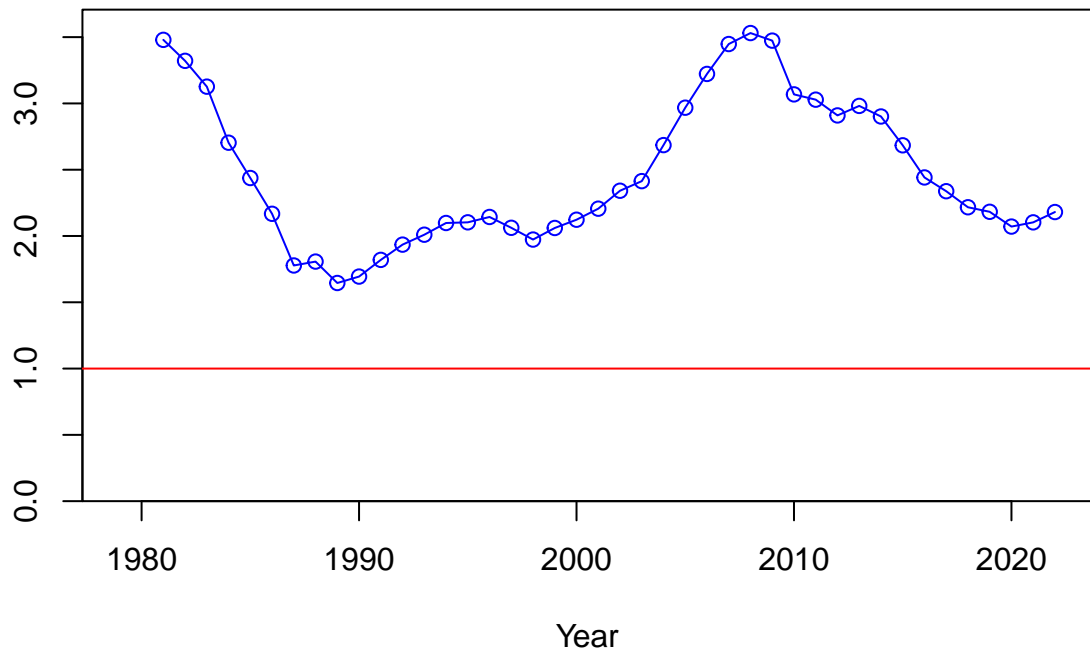




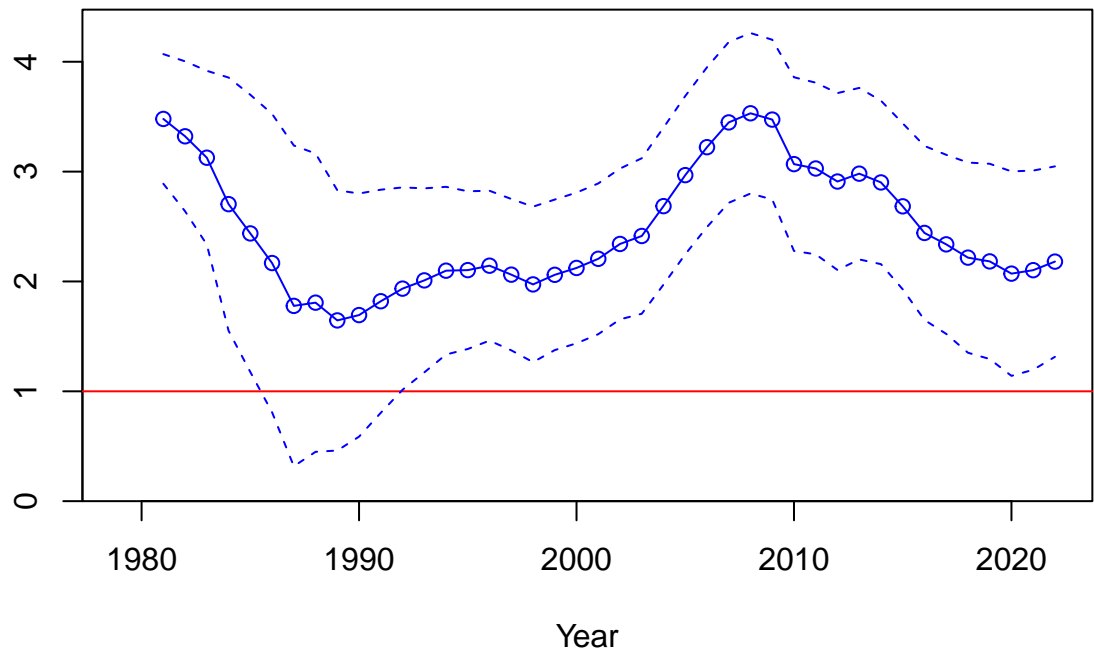
Spawning biomass (mt)

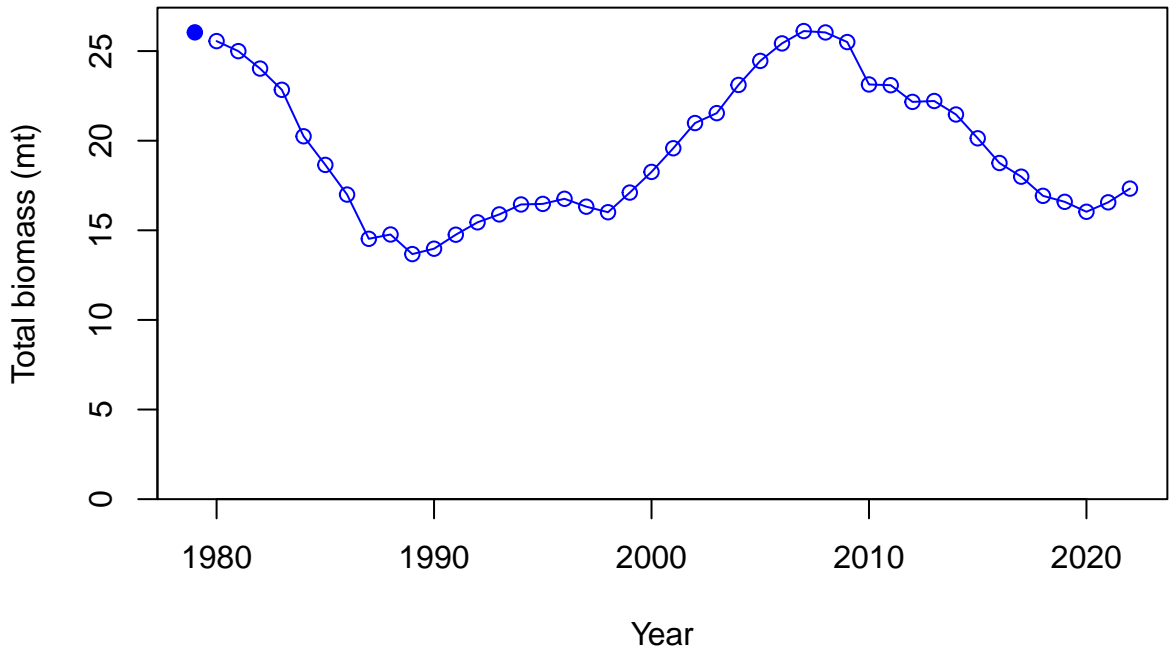


Relative spawning biomass: B/B_{MSY}

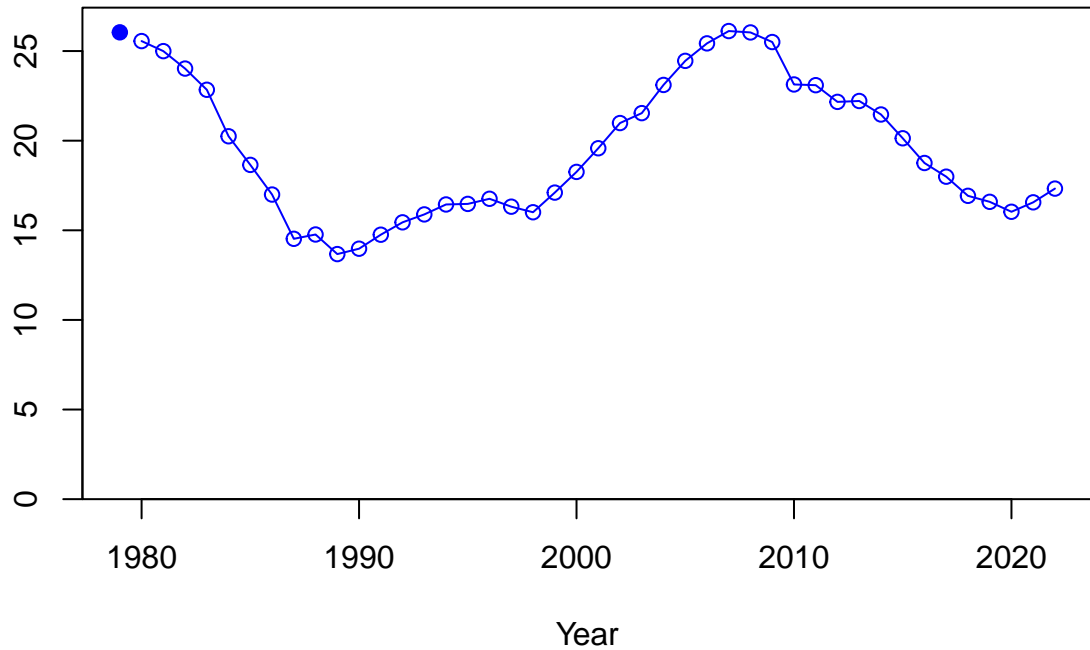


Relative spawning biomass: B/B_{MSY}

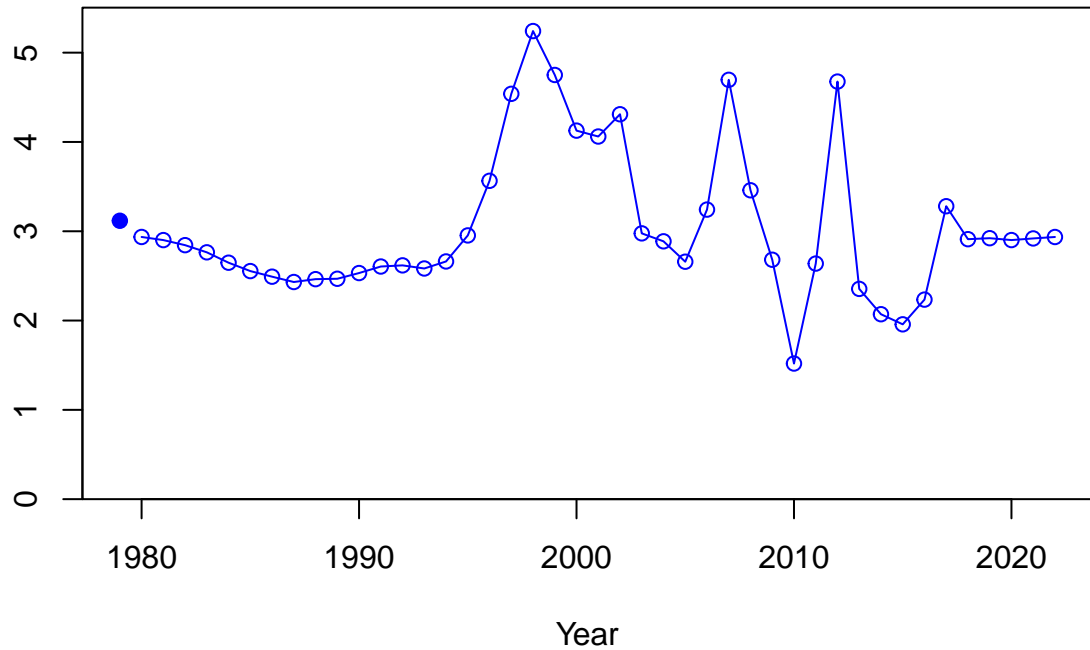




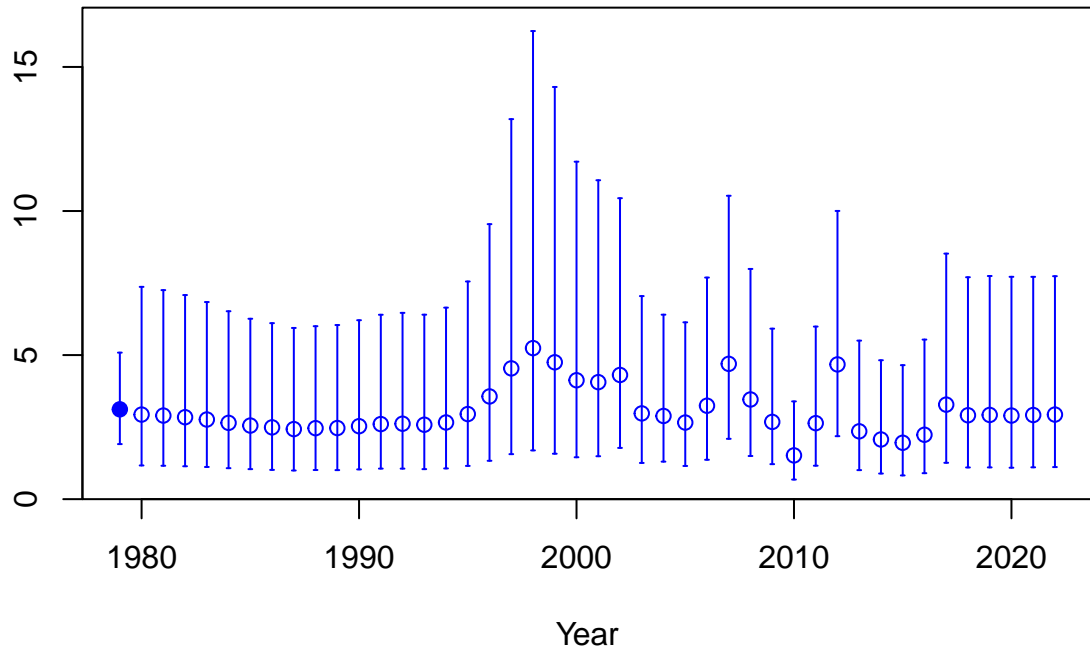
Summary biomass (mt)



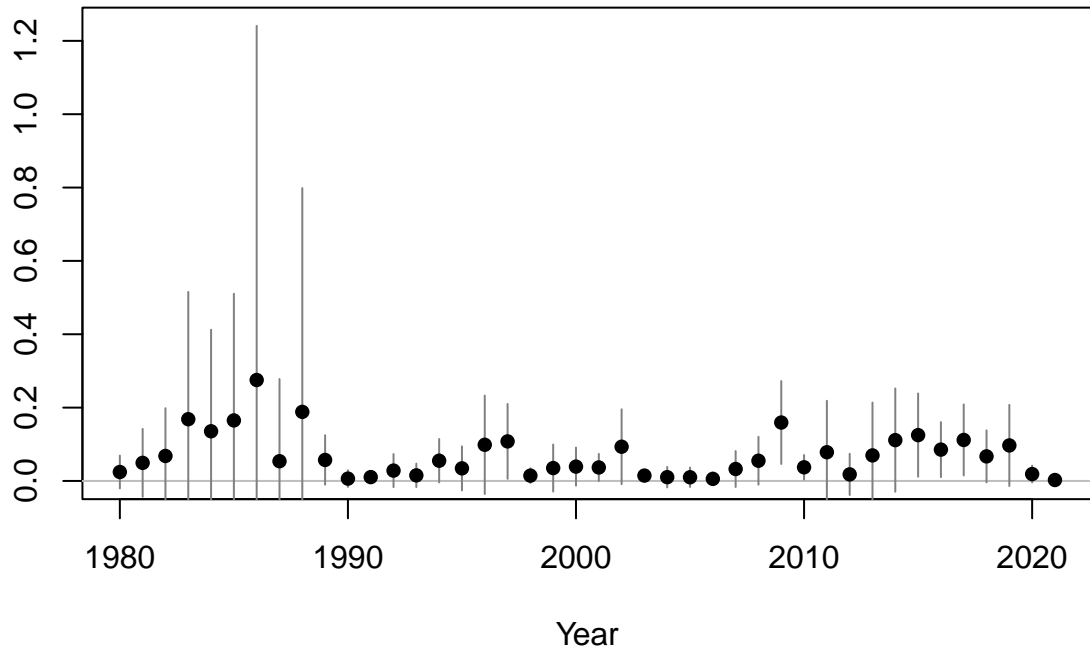
Age-0 recruits (1,000s)

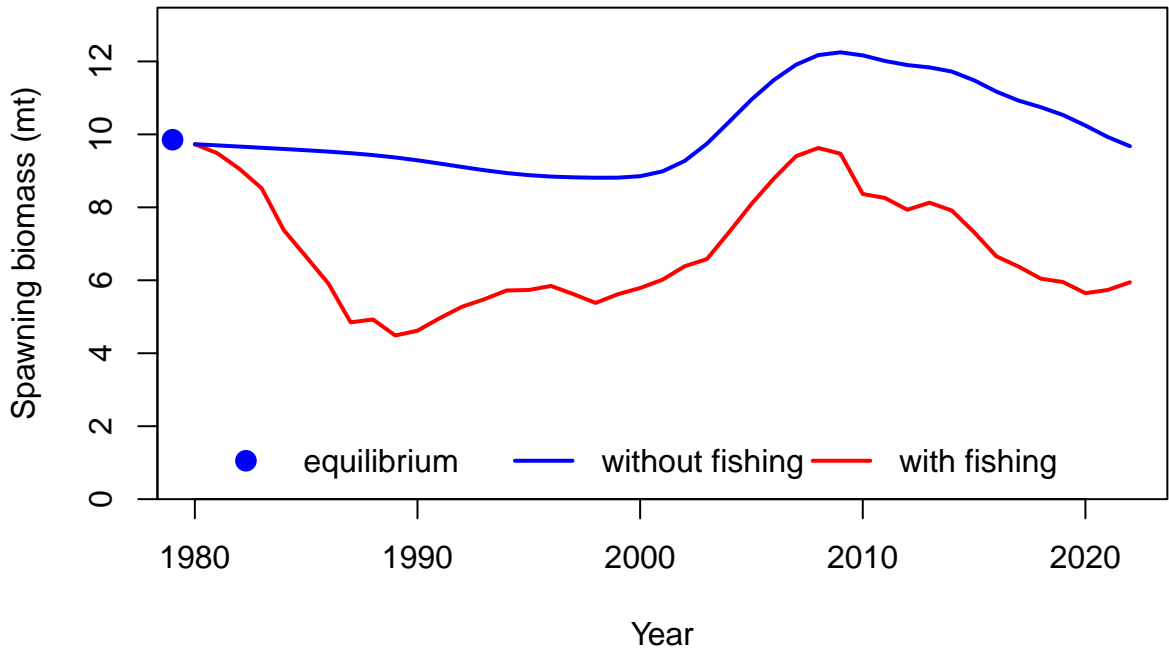


Age-0 recruits (1,000s)

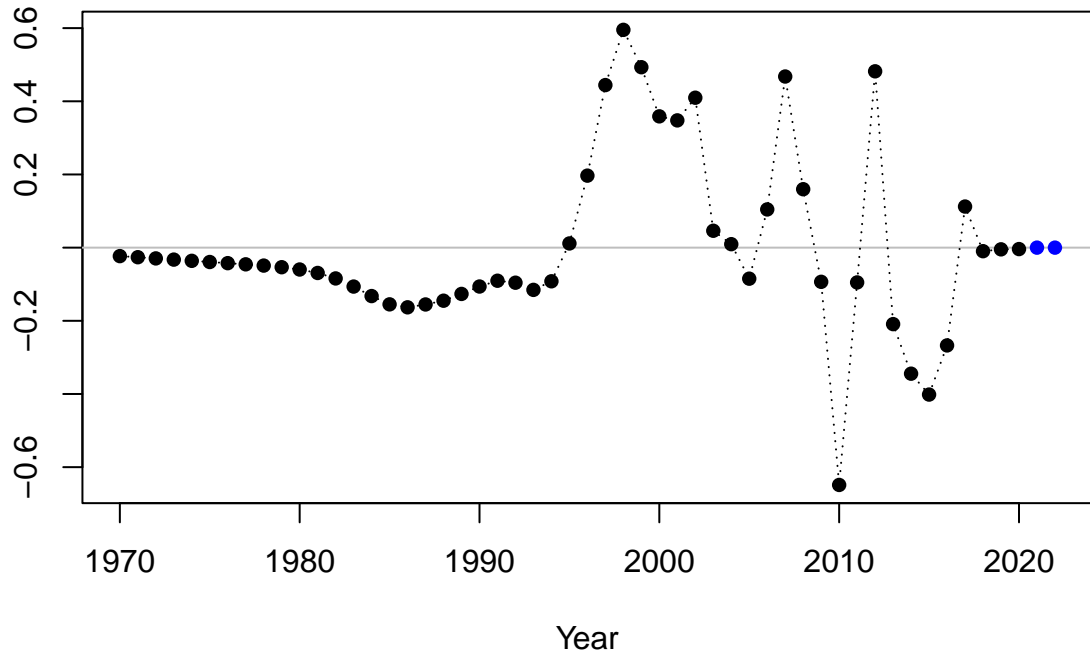


Summary Fishing Mortality

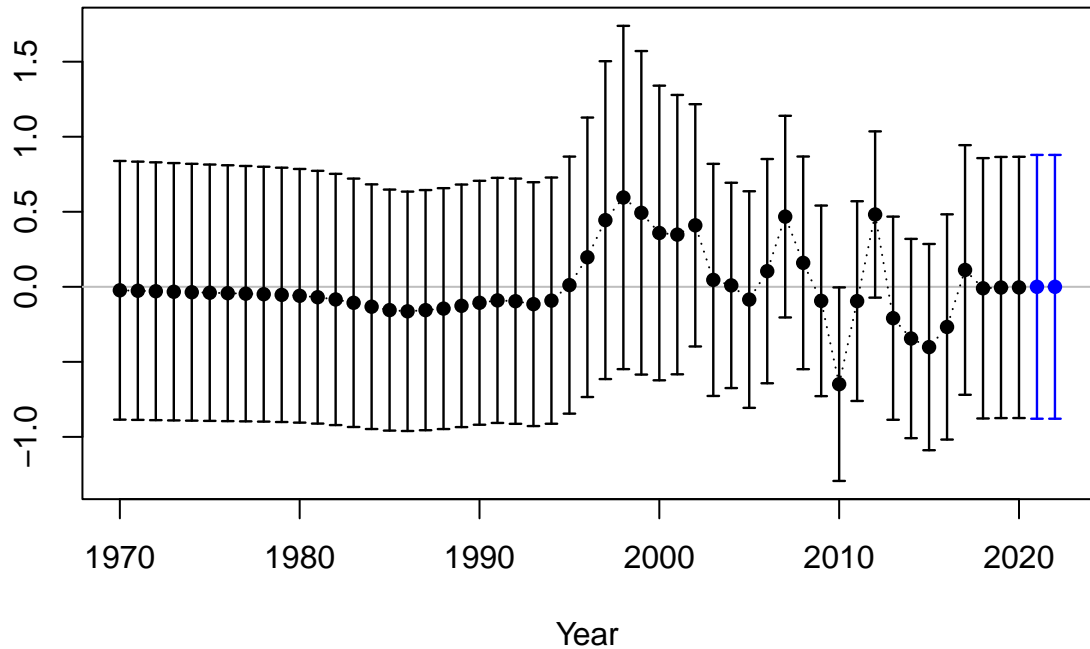




Log recruitment deviation

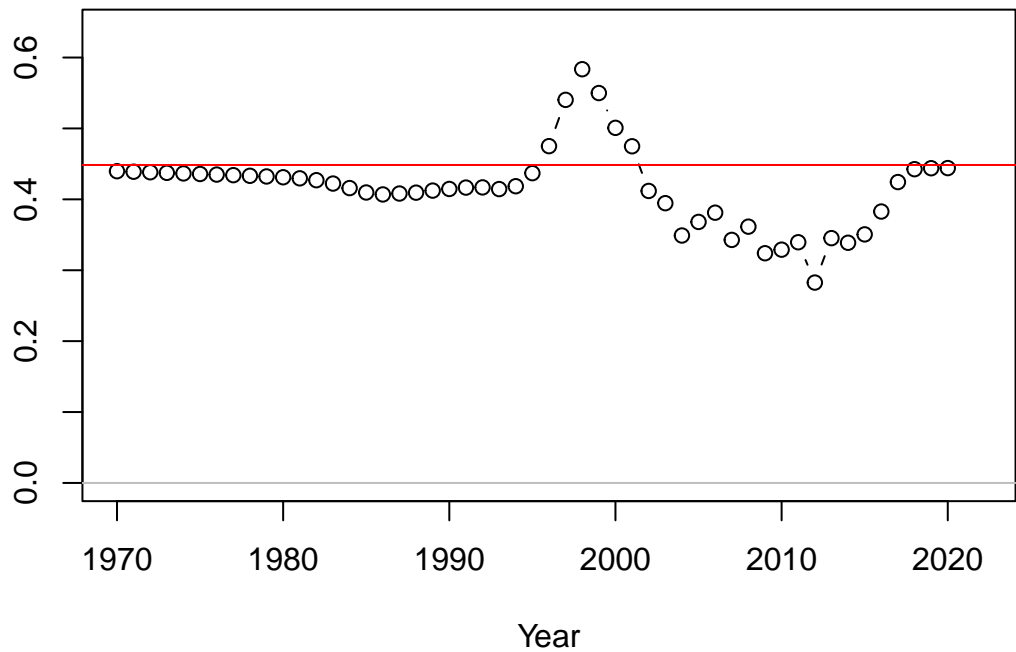


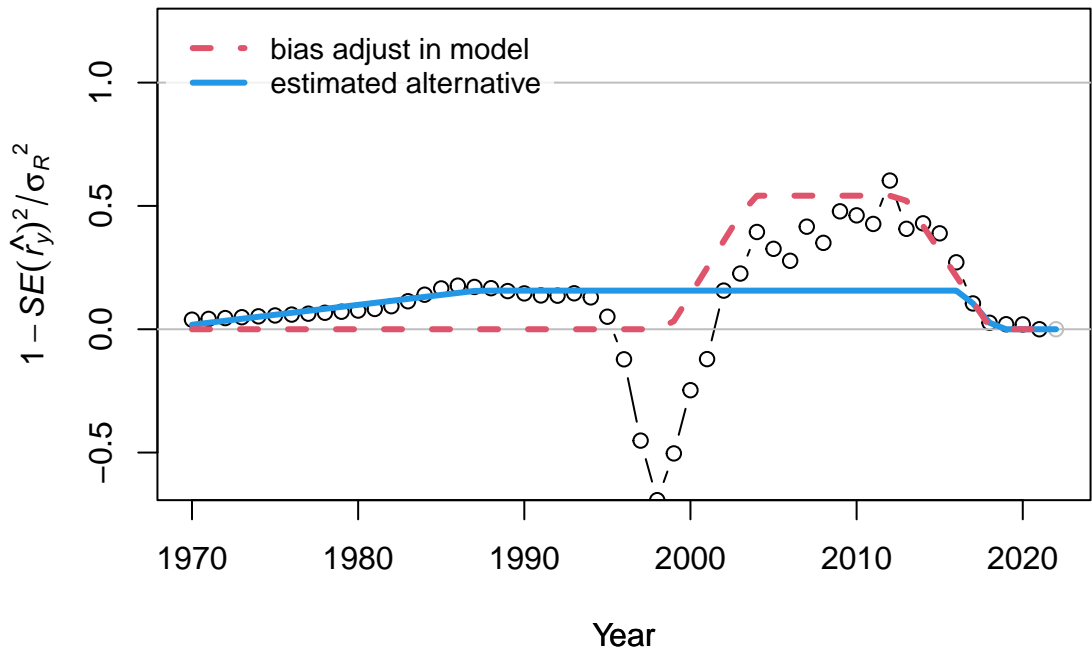
Log recruitment deviation

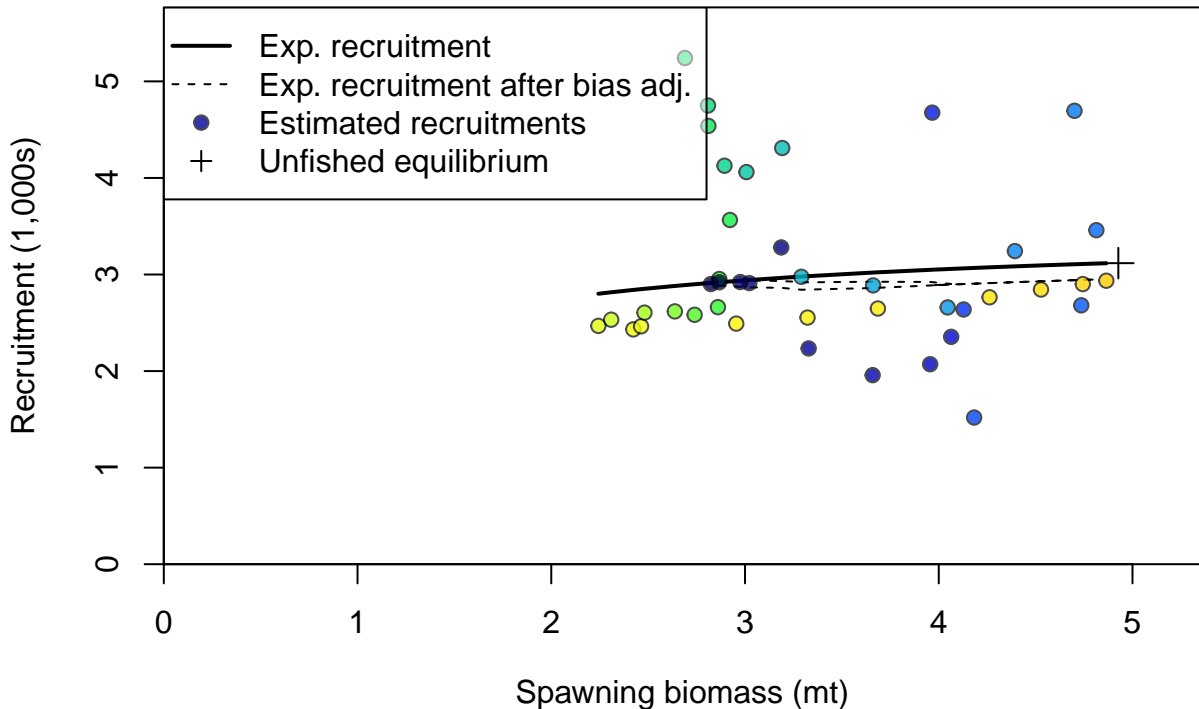


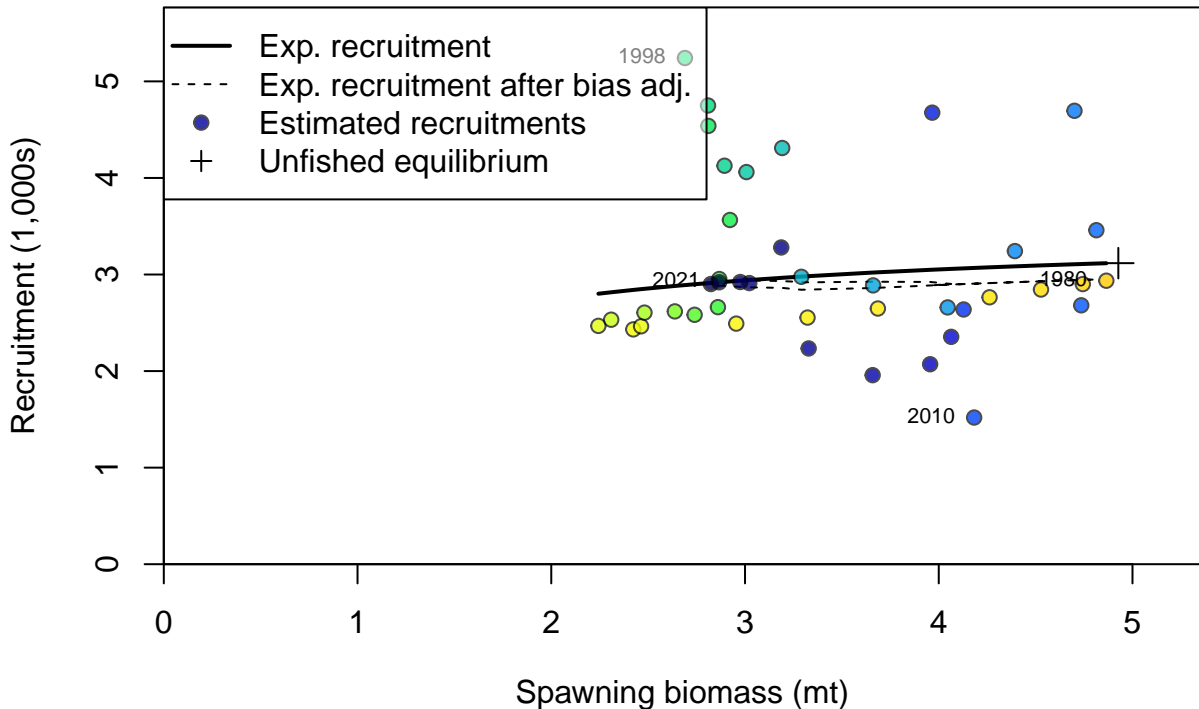
Recruitment deviation variance

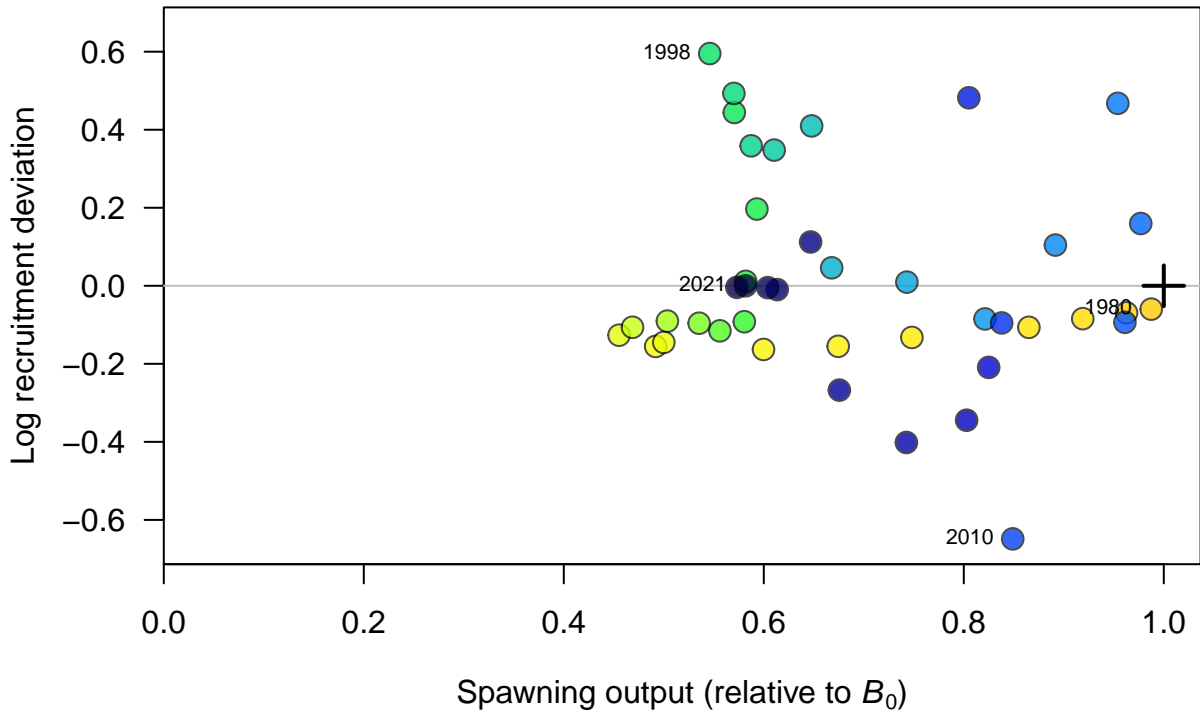
Asymptotic standard error estimate

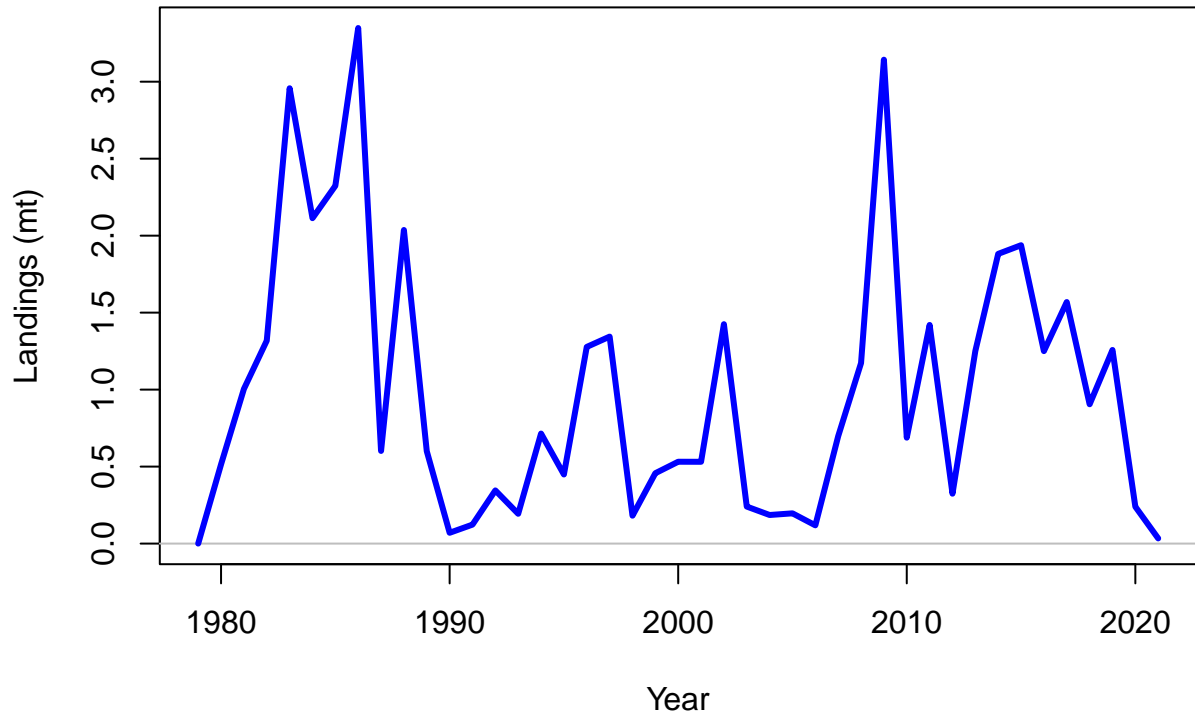


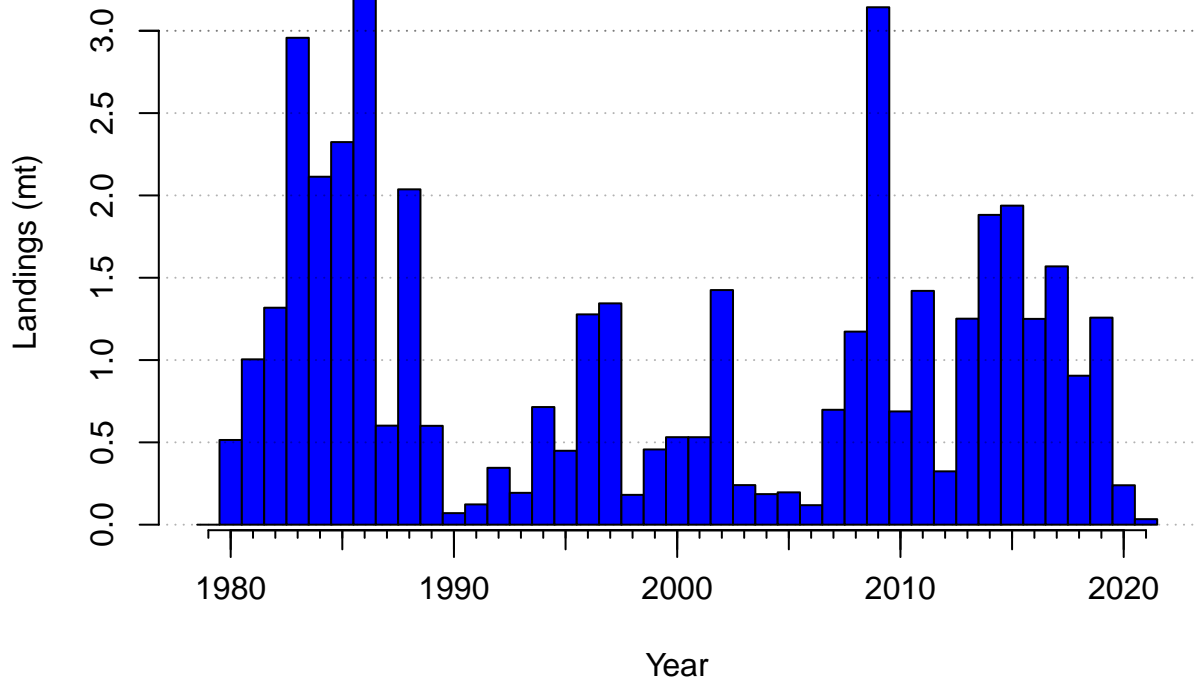


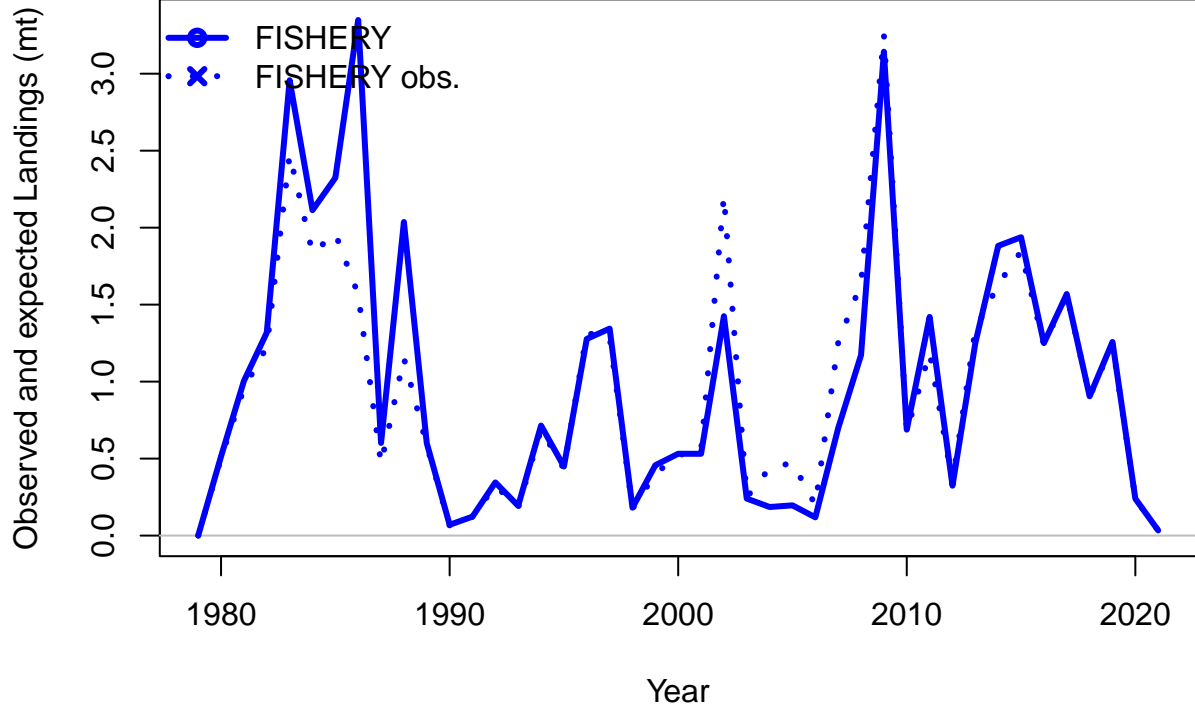


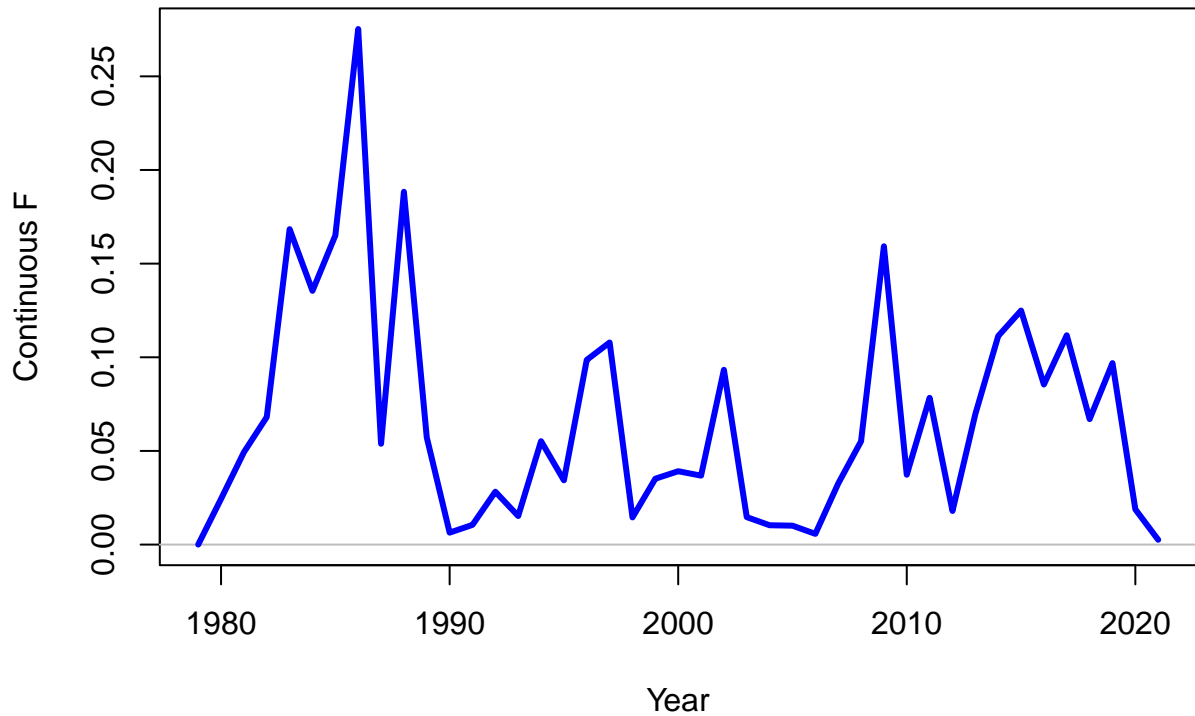




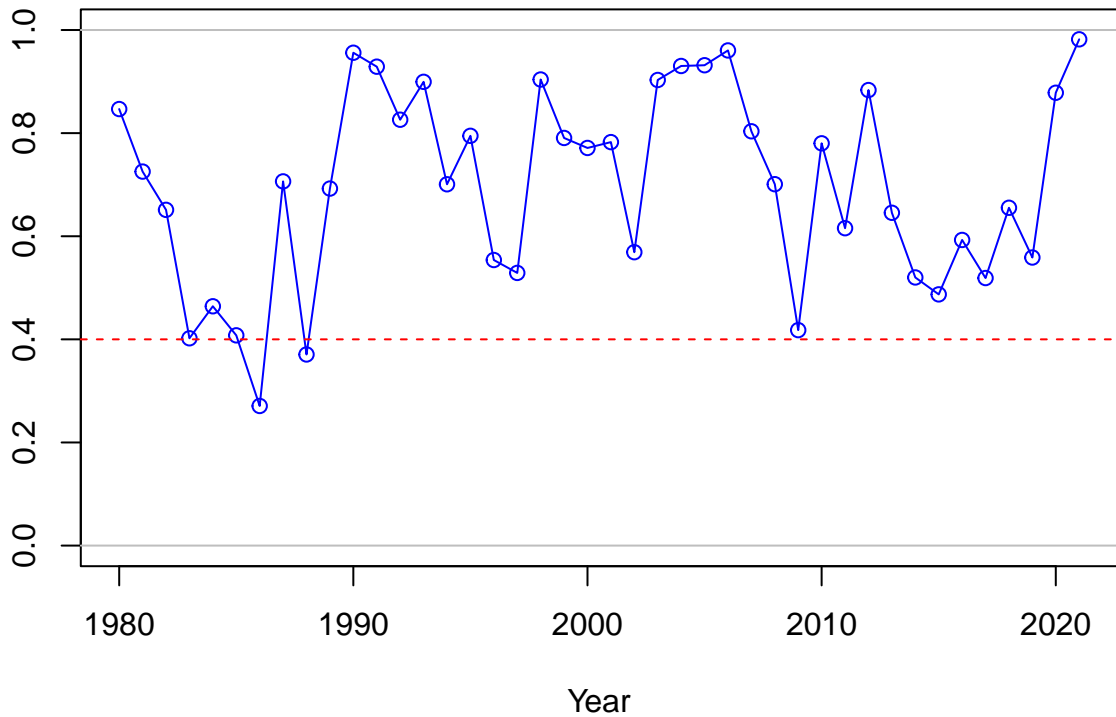


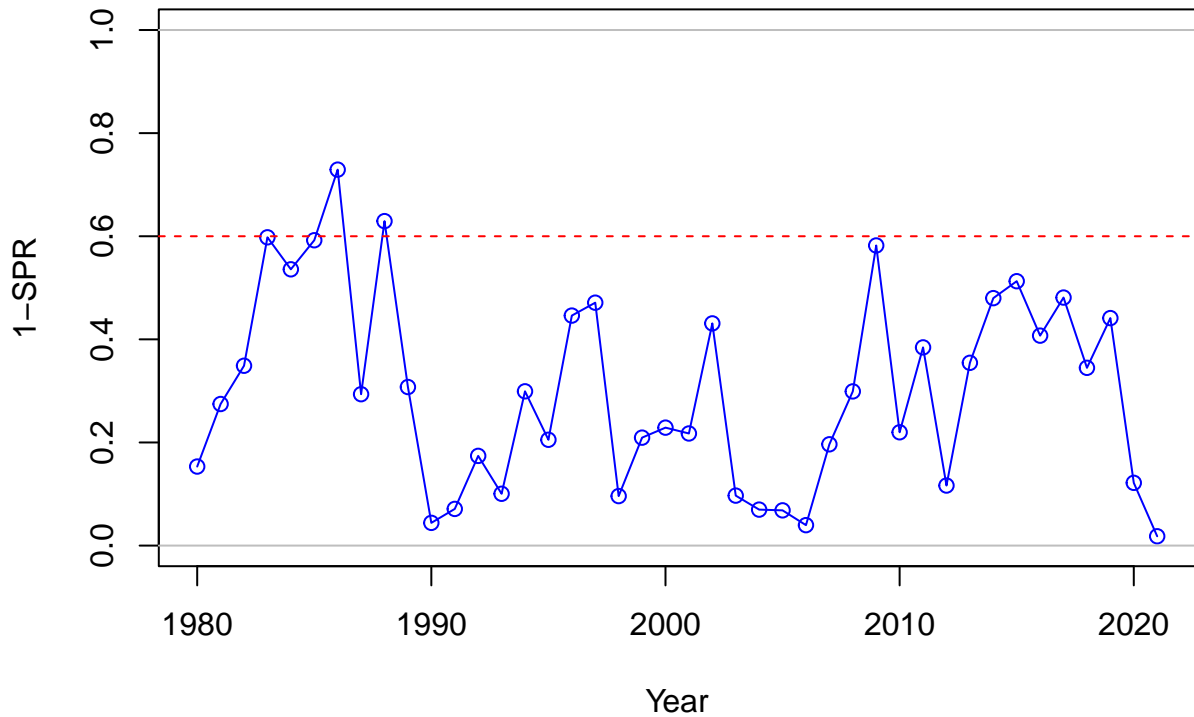




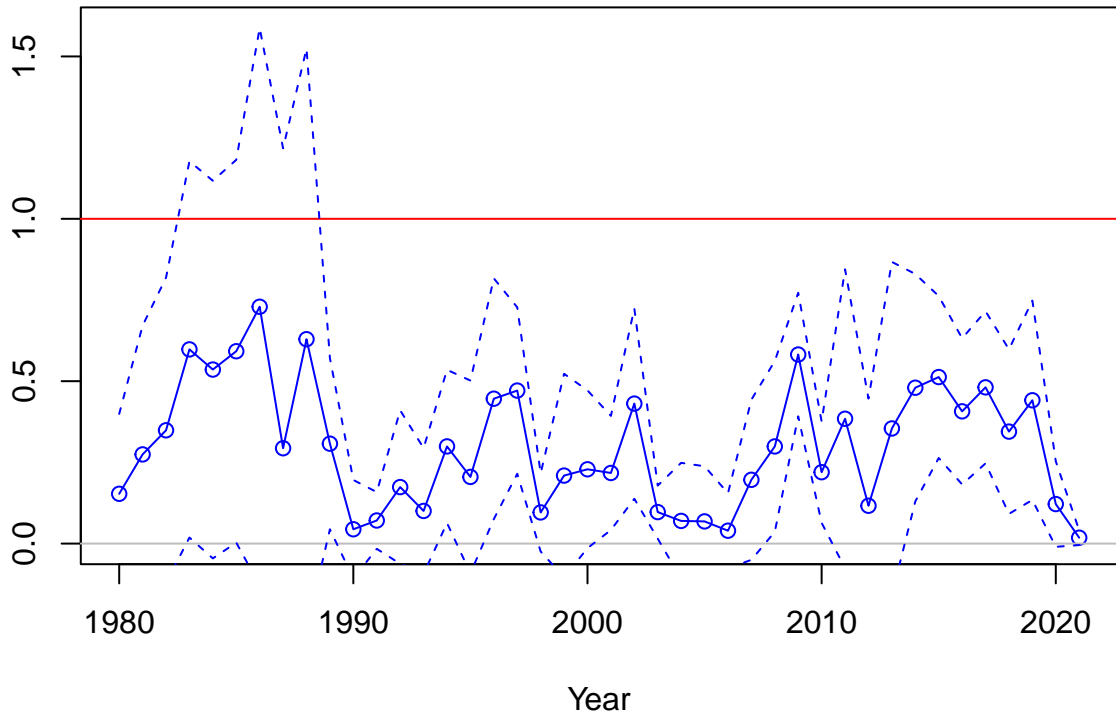


SPR

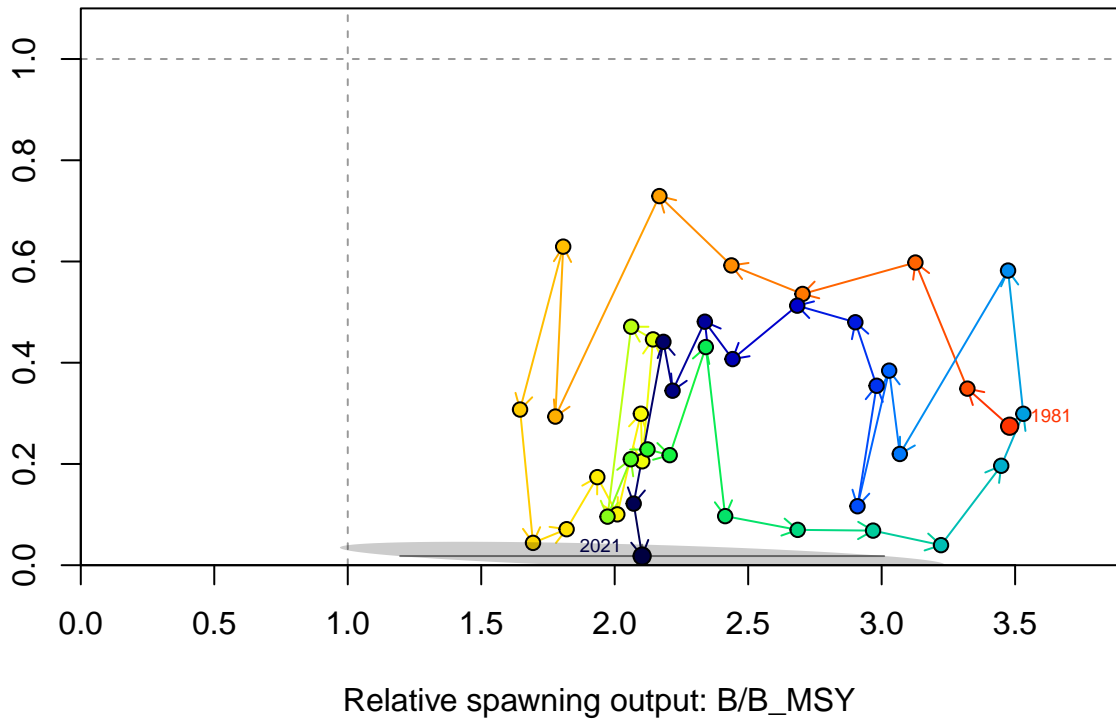




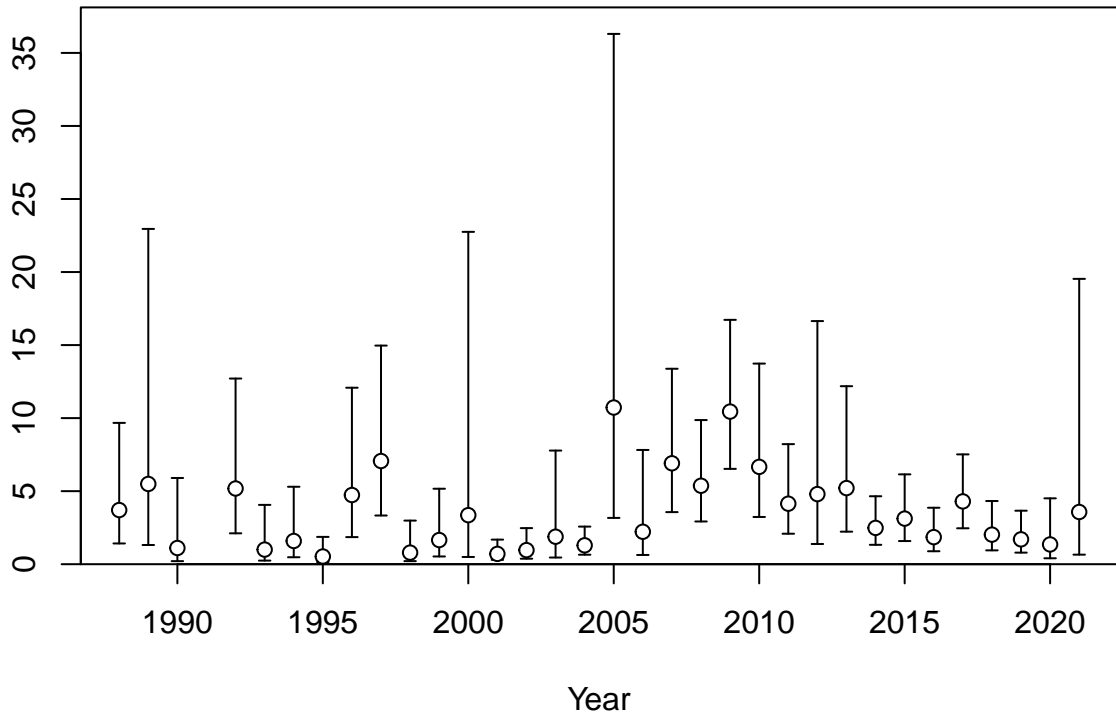
Fishing intensity: 1-SPR



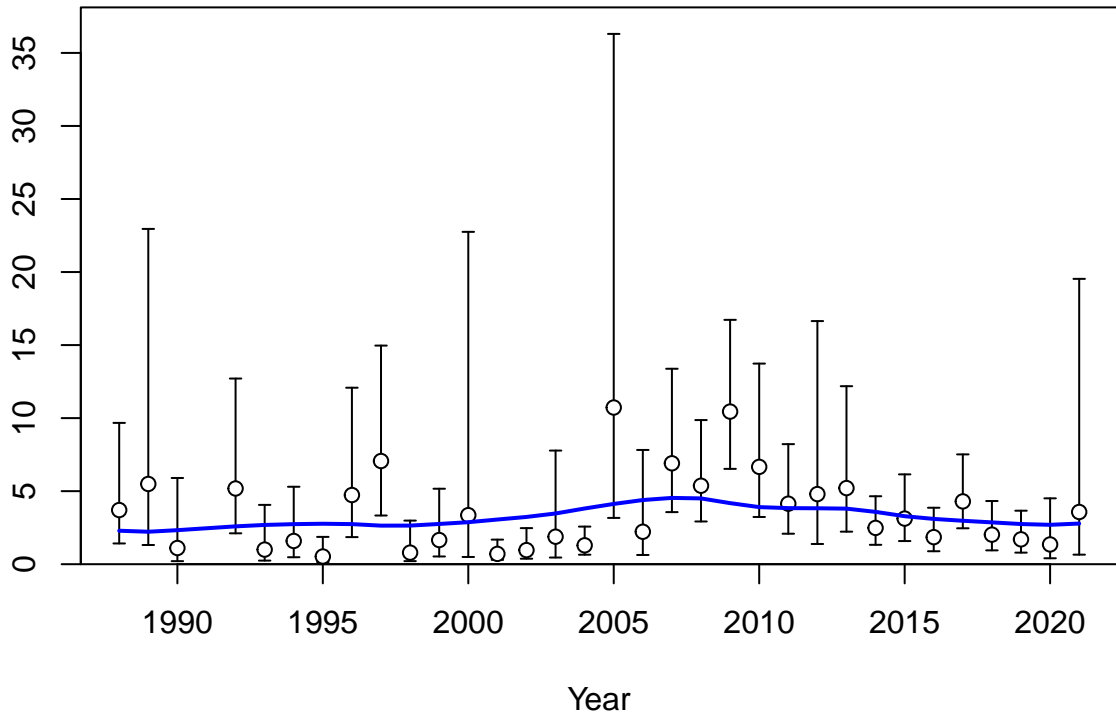
Fishing intensity: 1-SPR

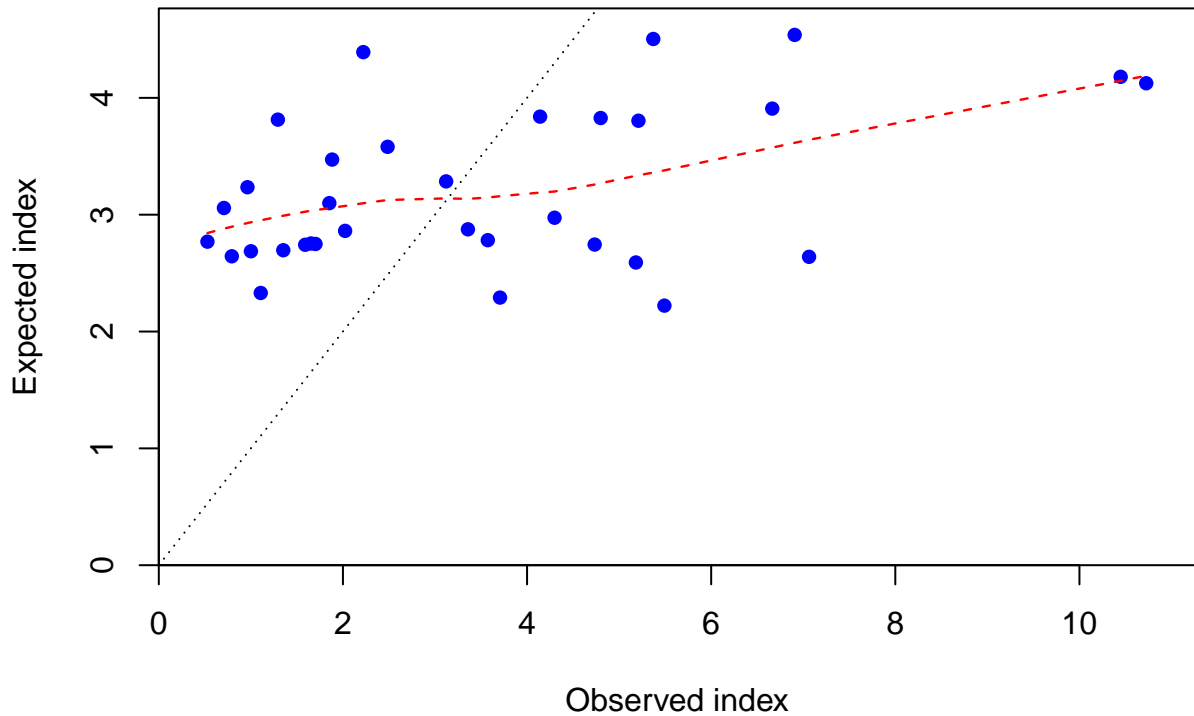


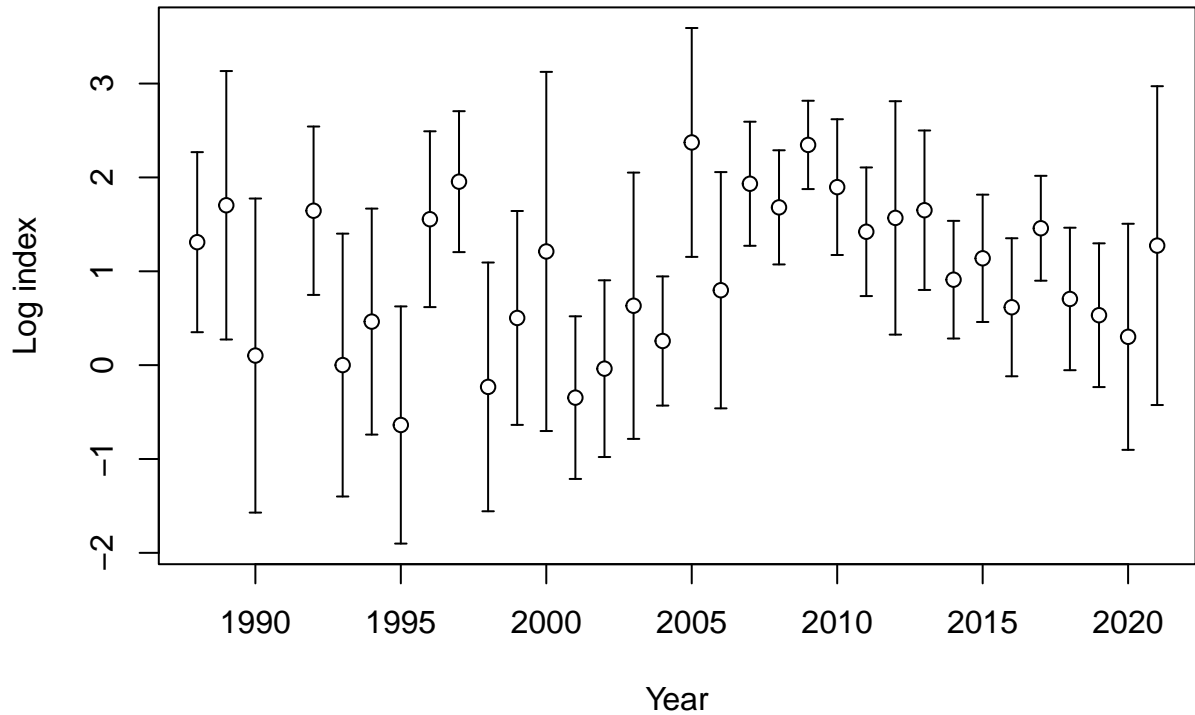
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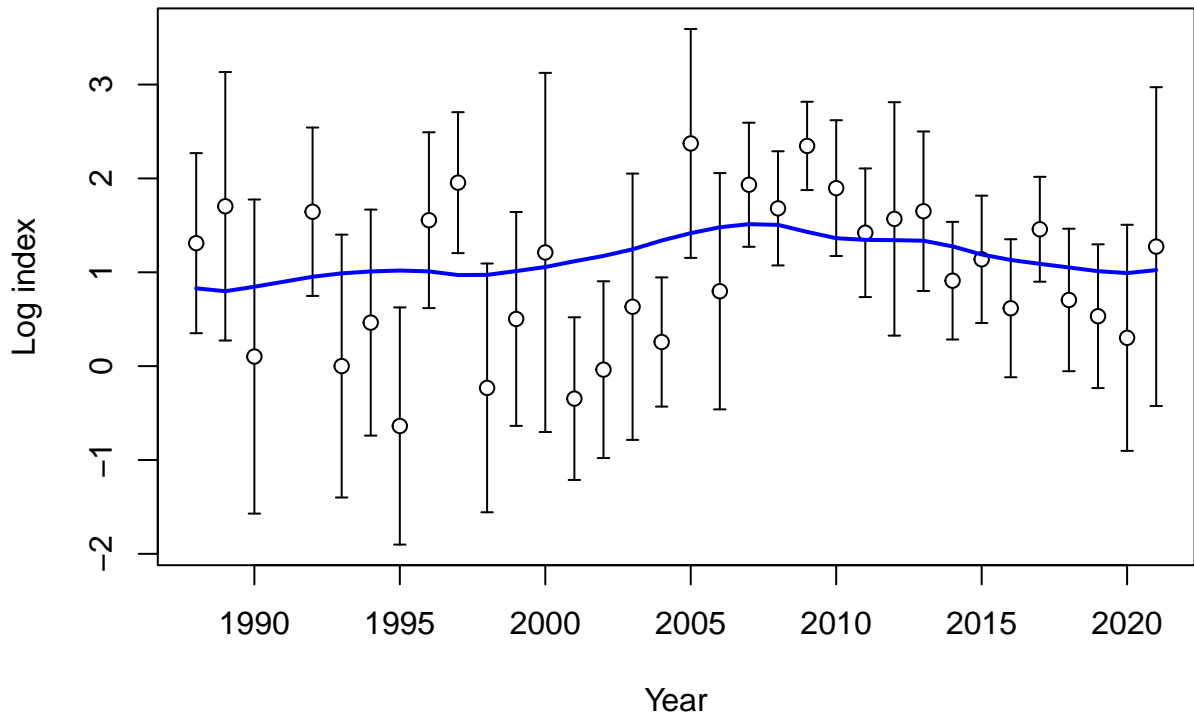


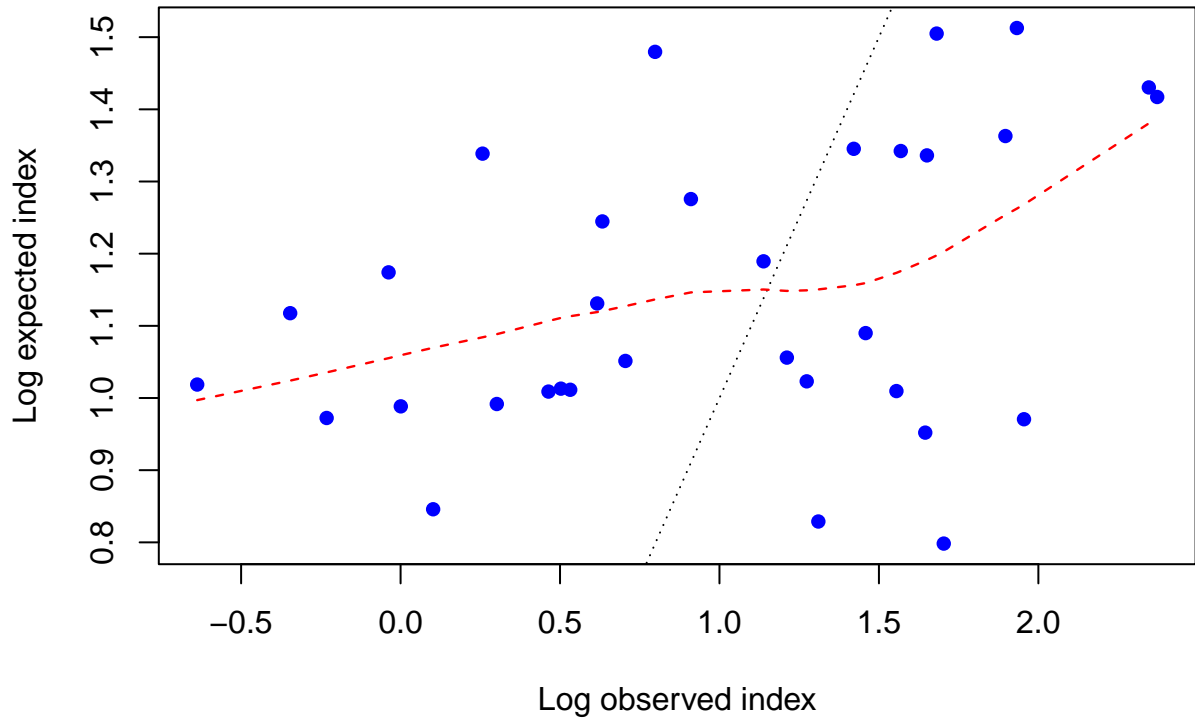
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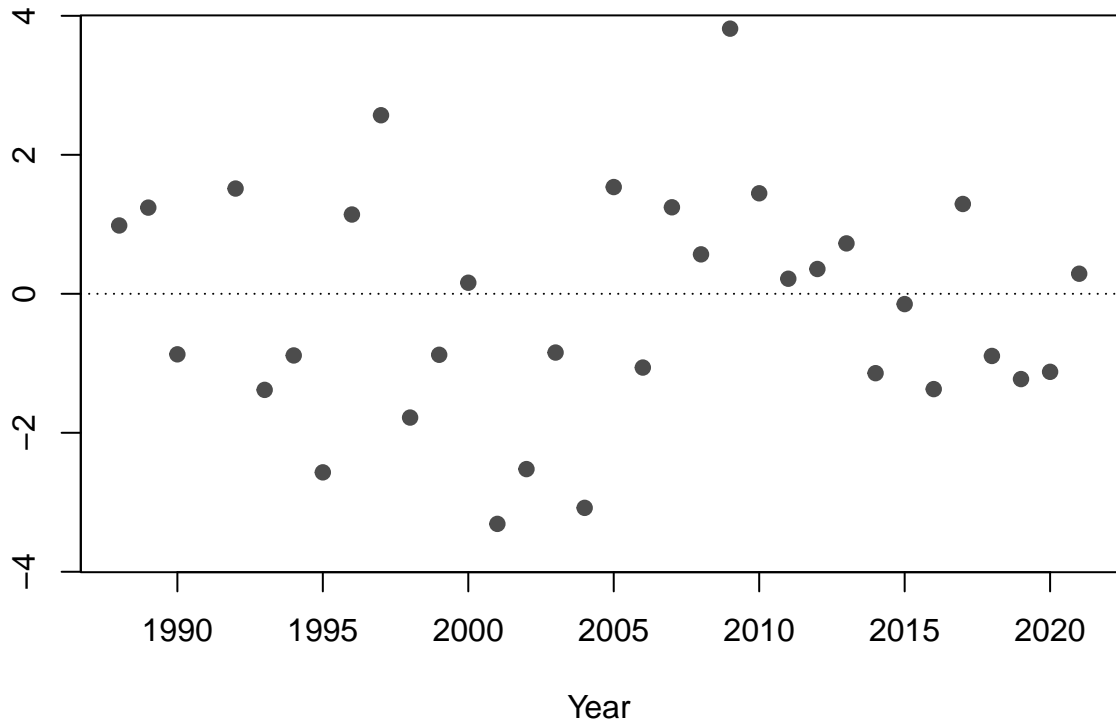


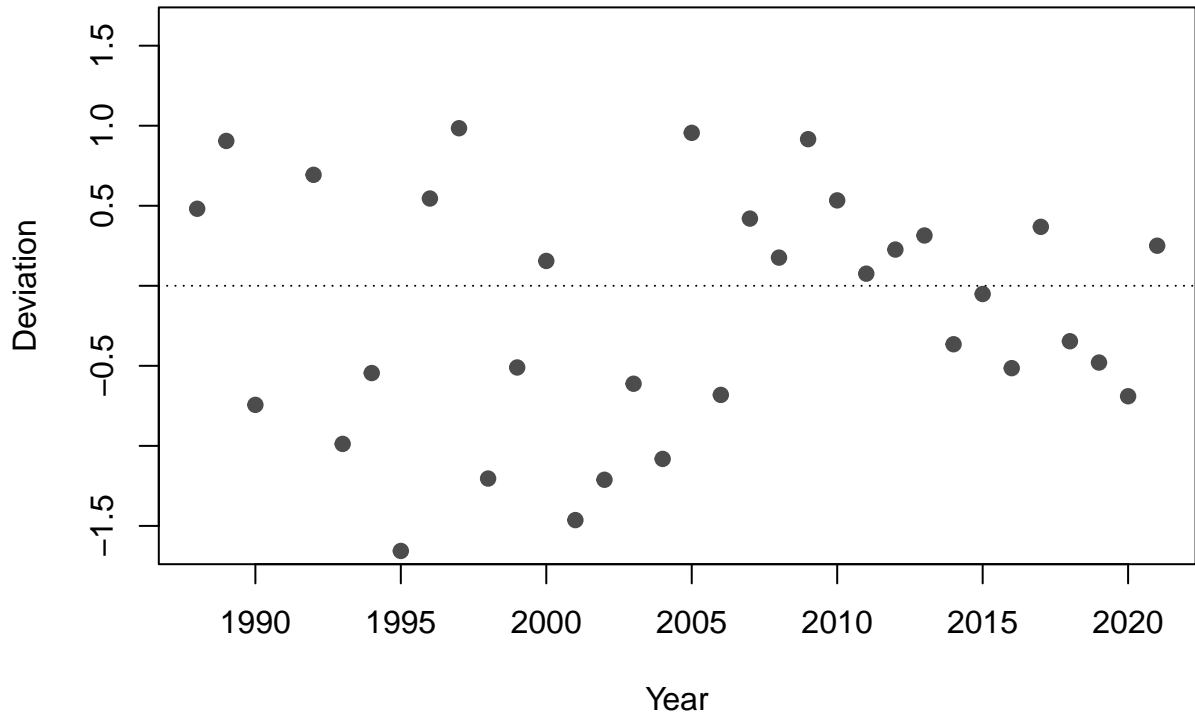


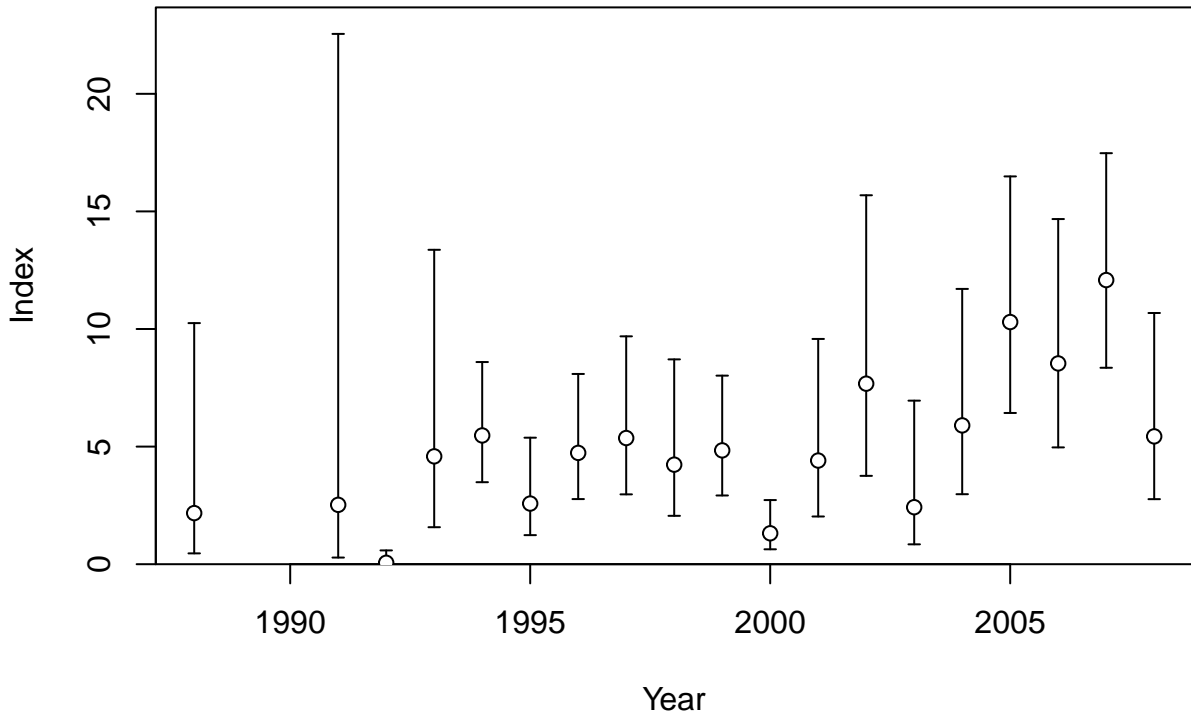


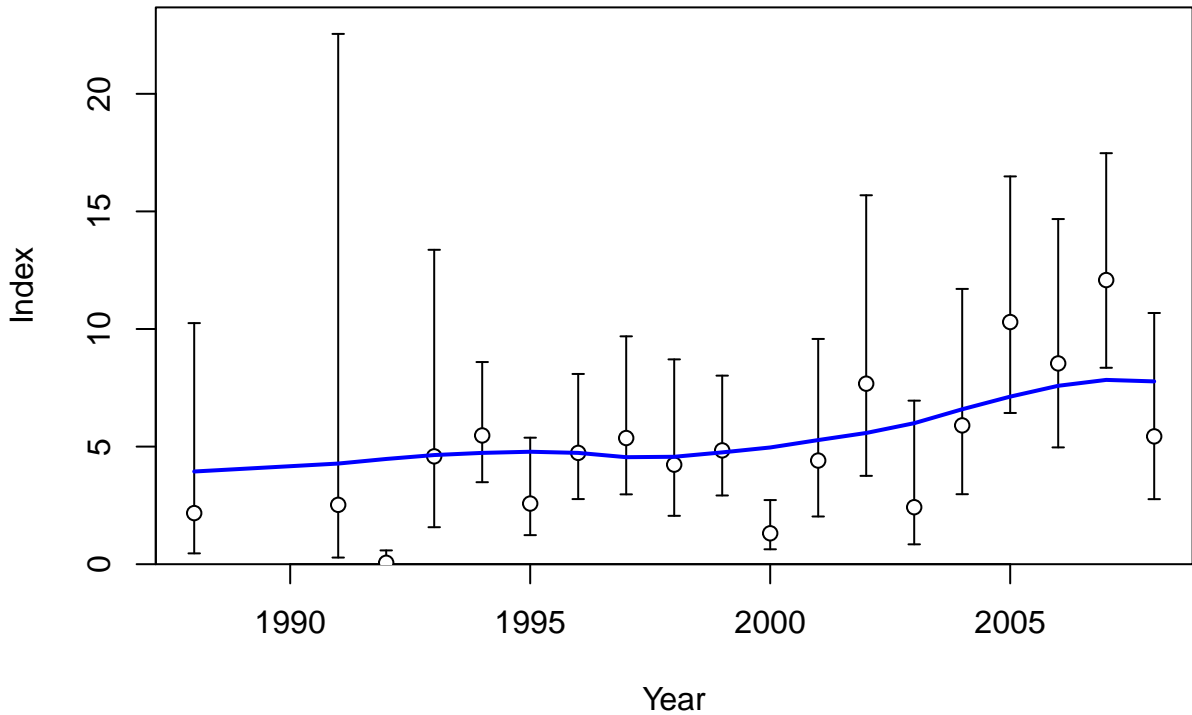


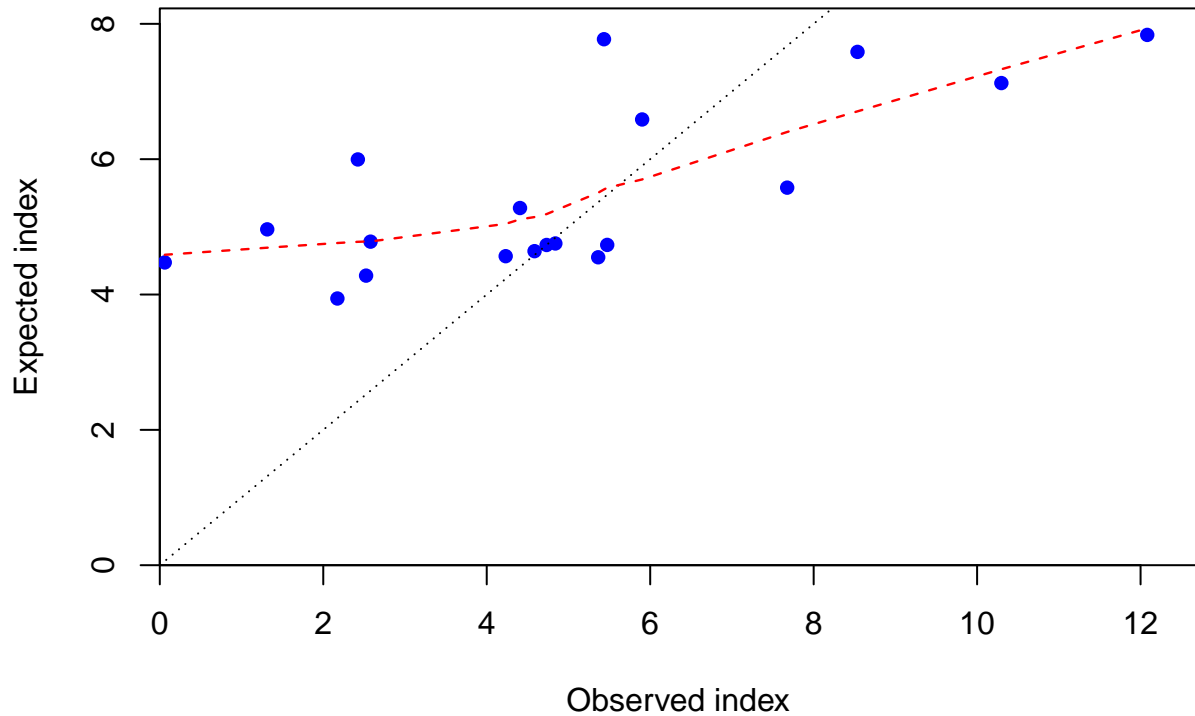
Residual

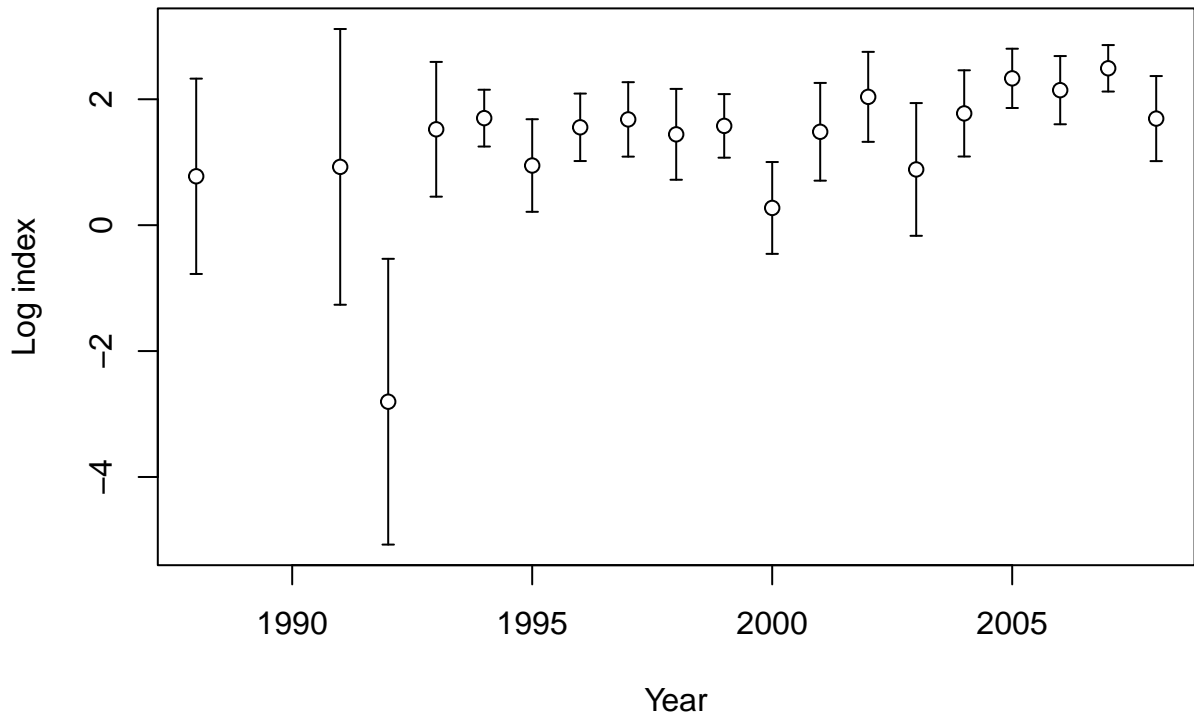


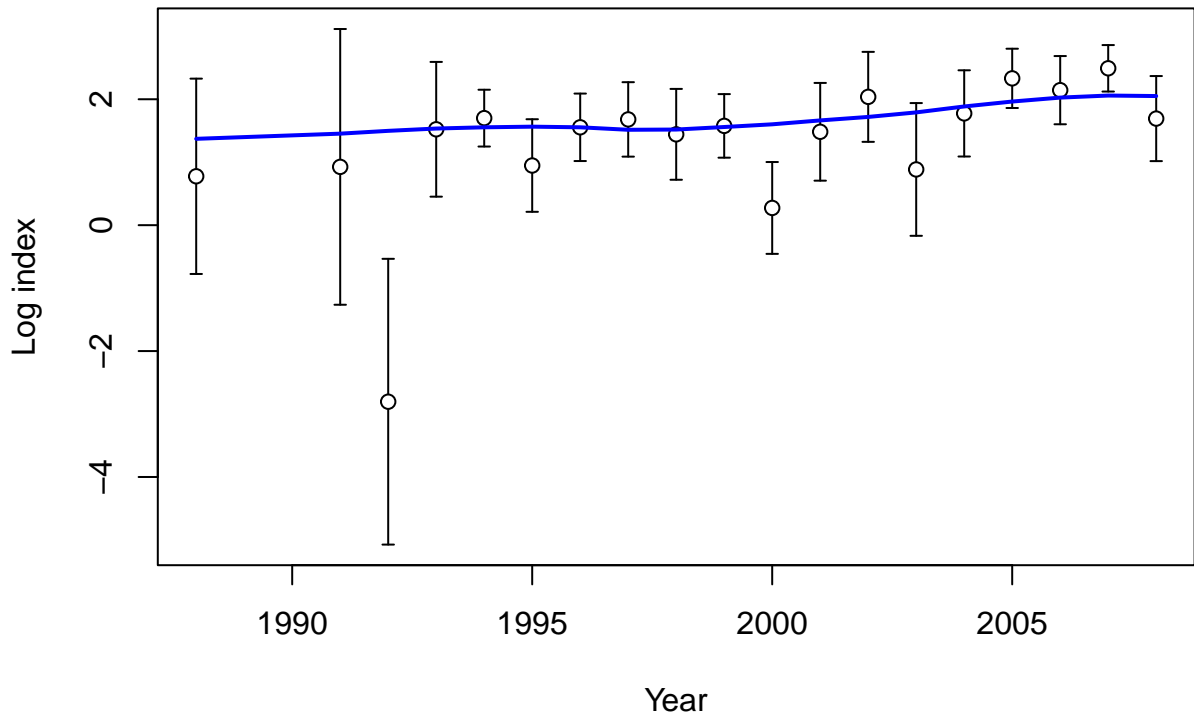


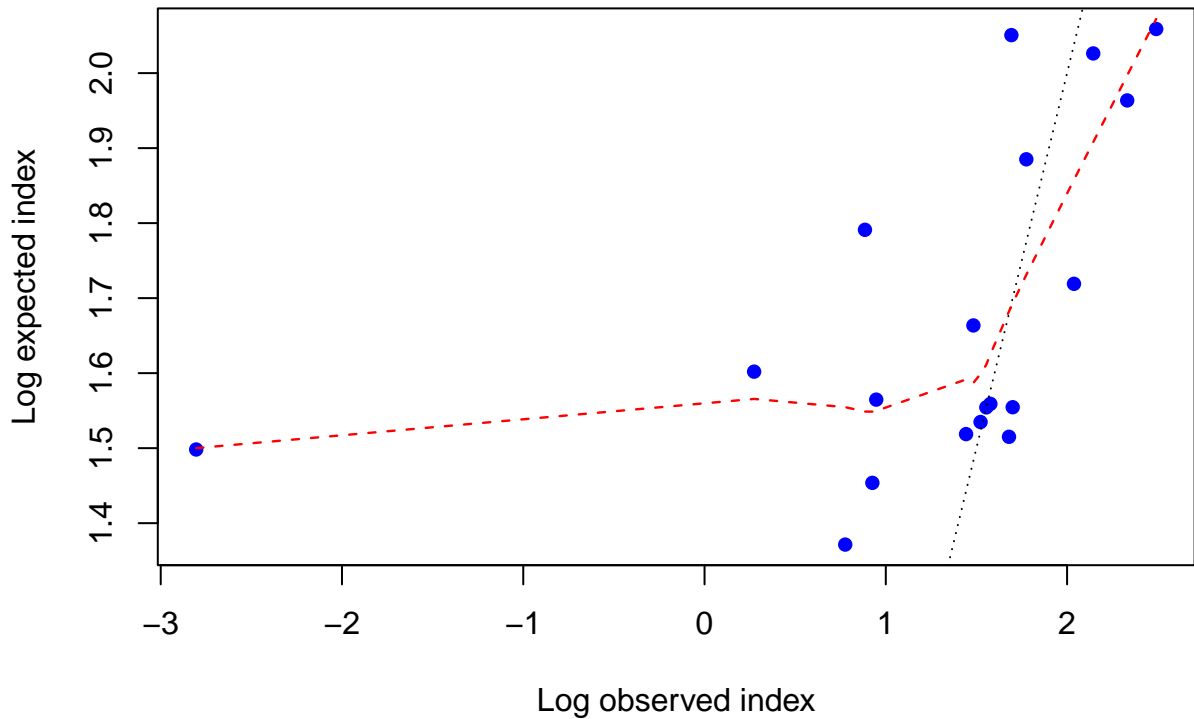


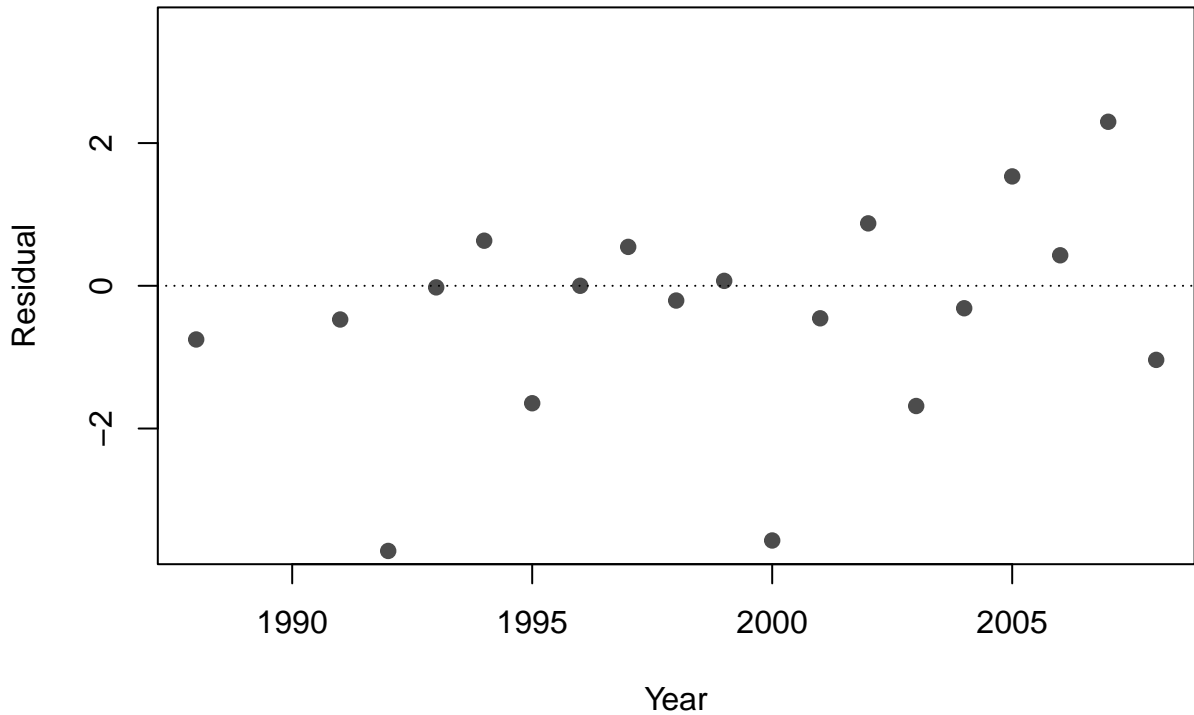


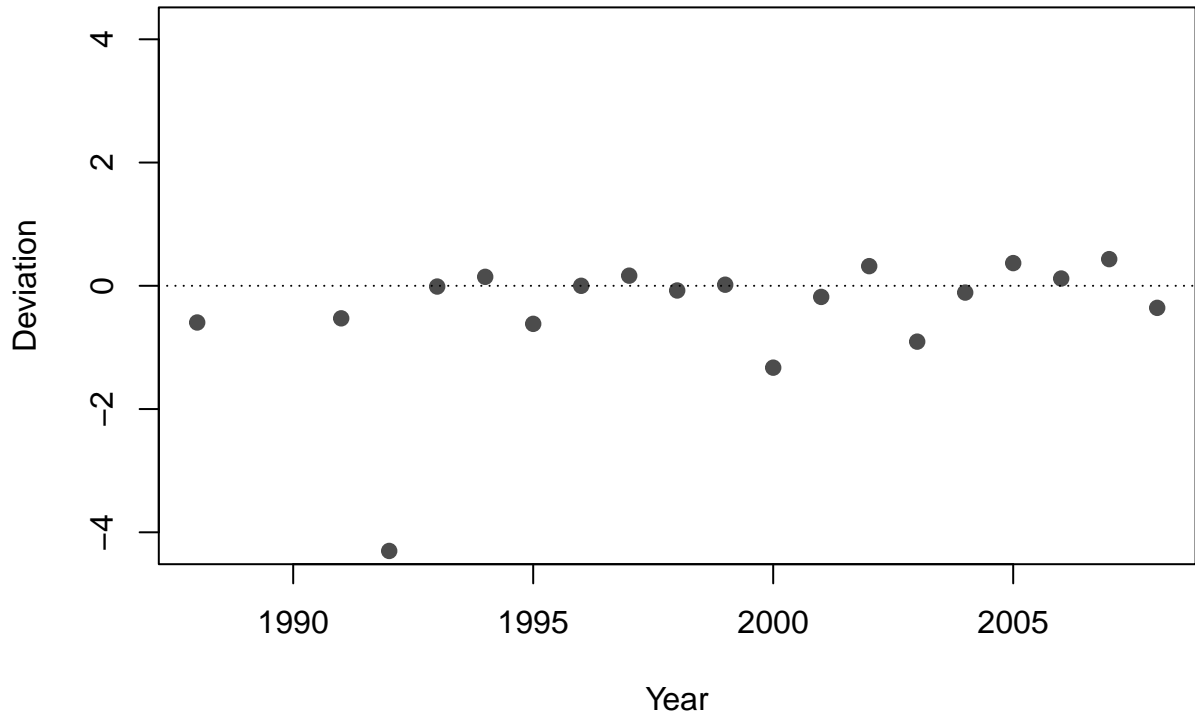




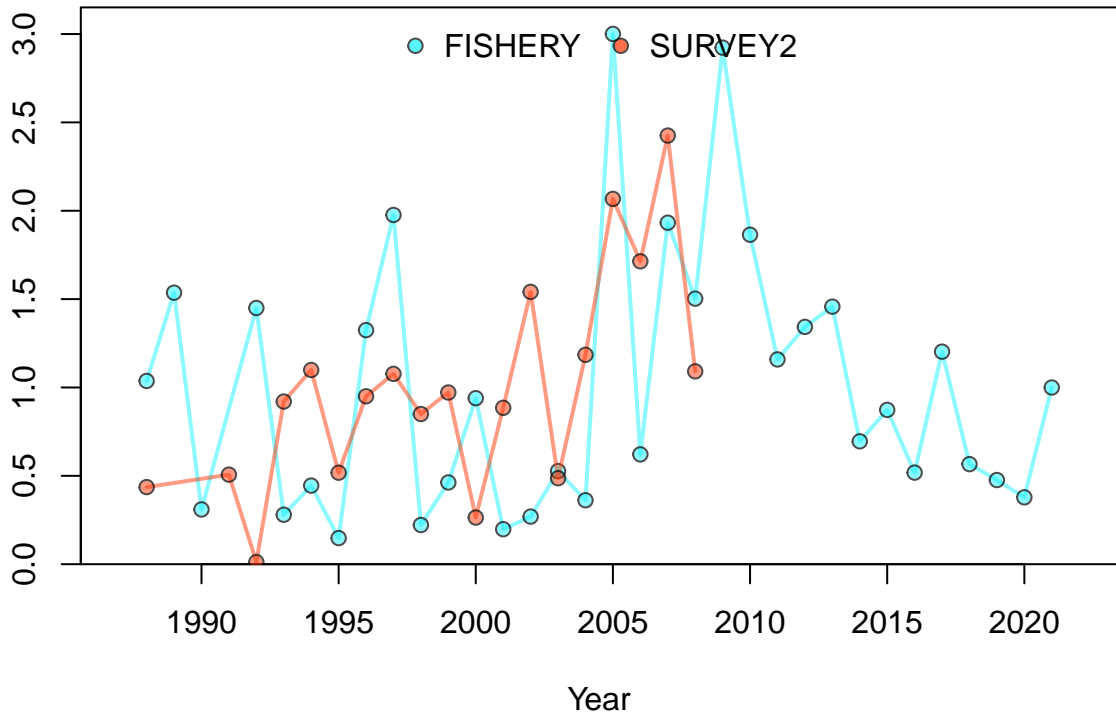


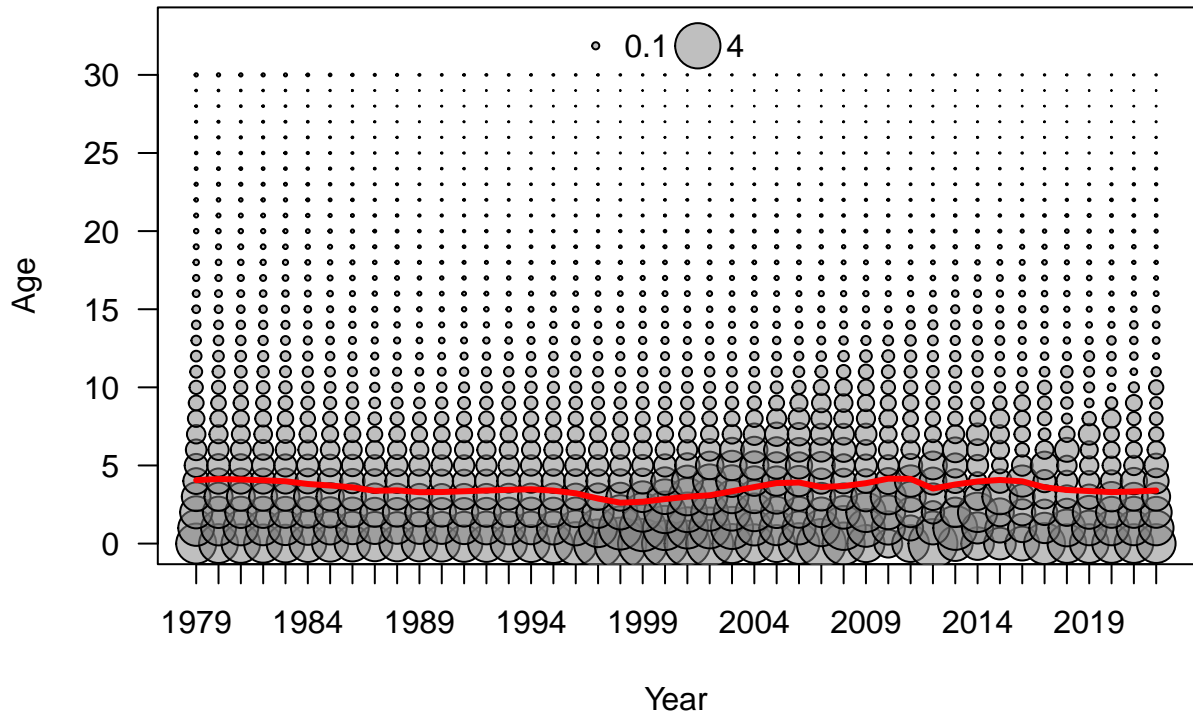


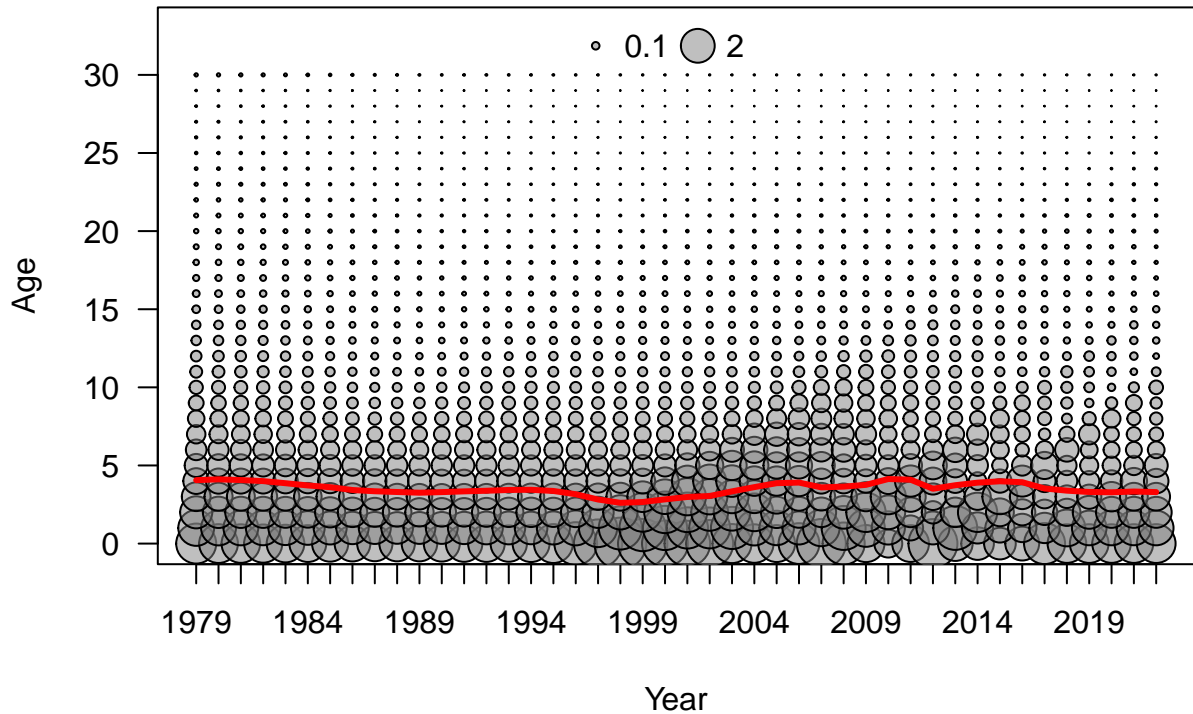




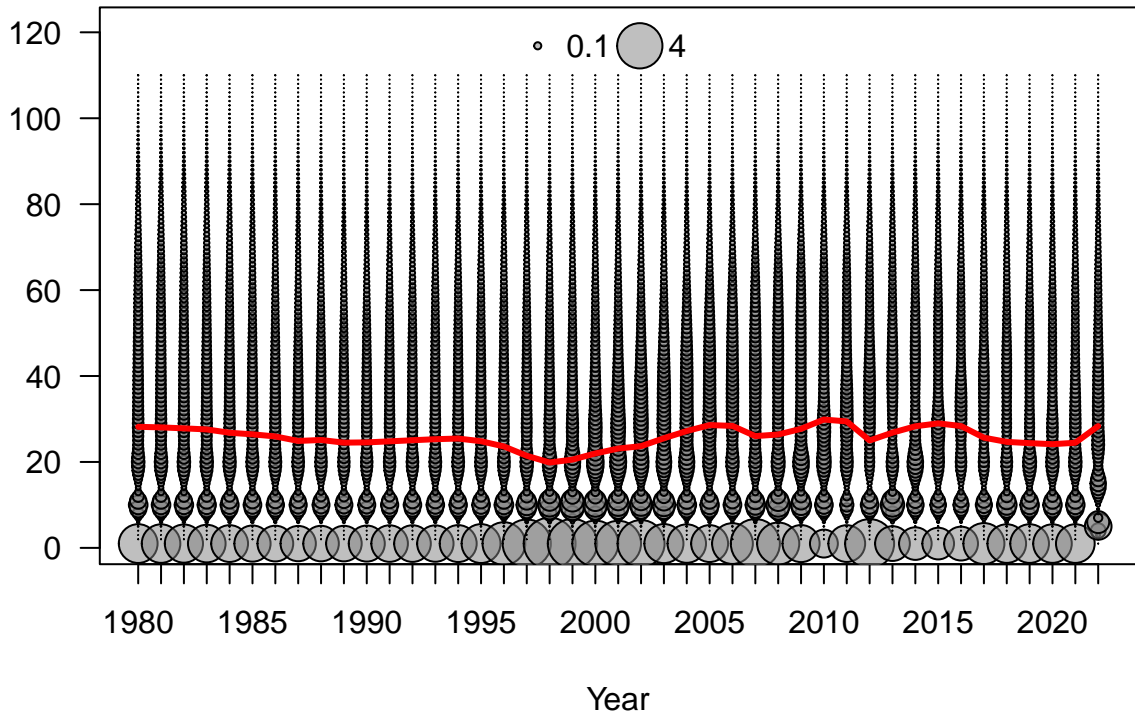
Standardized index







Length



Length

120

100

80

60

40

20

0

○ 0.1 ● 2

1980

1985

1990

1995

2000

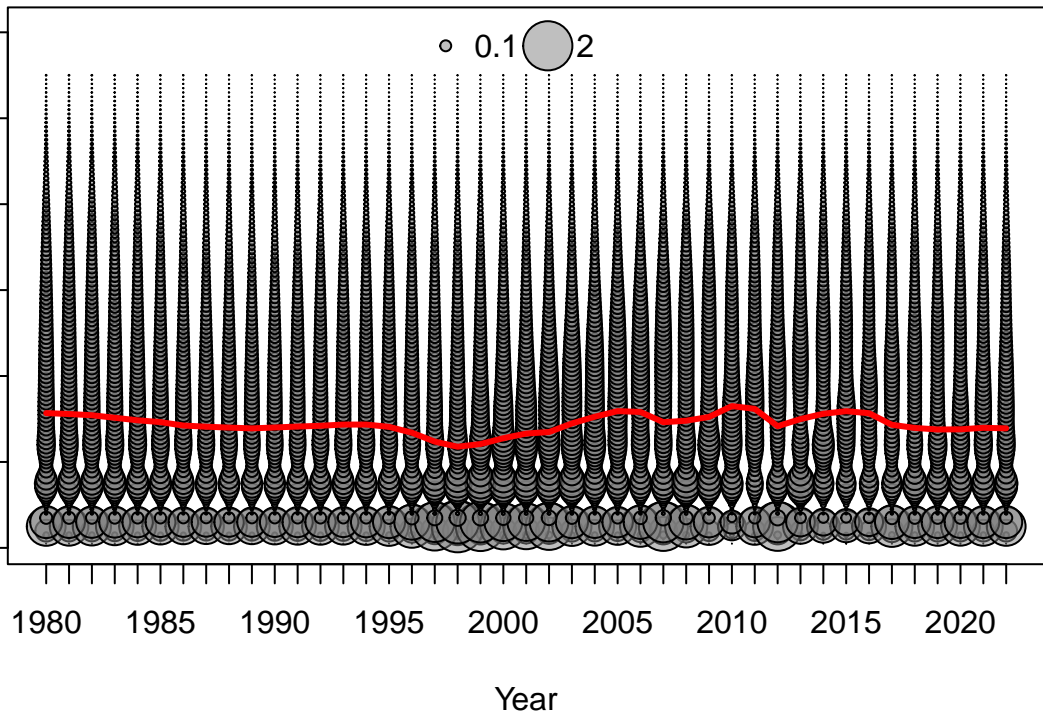
2005

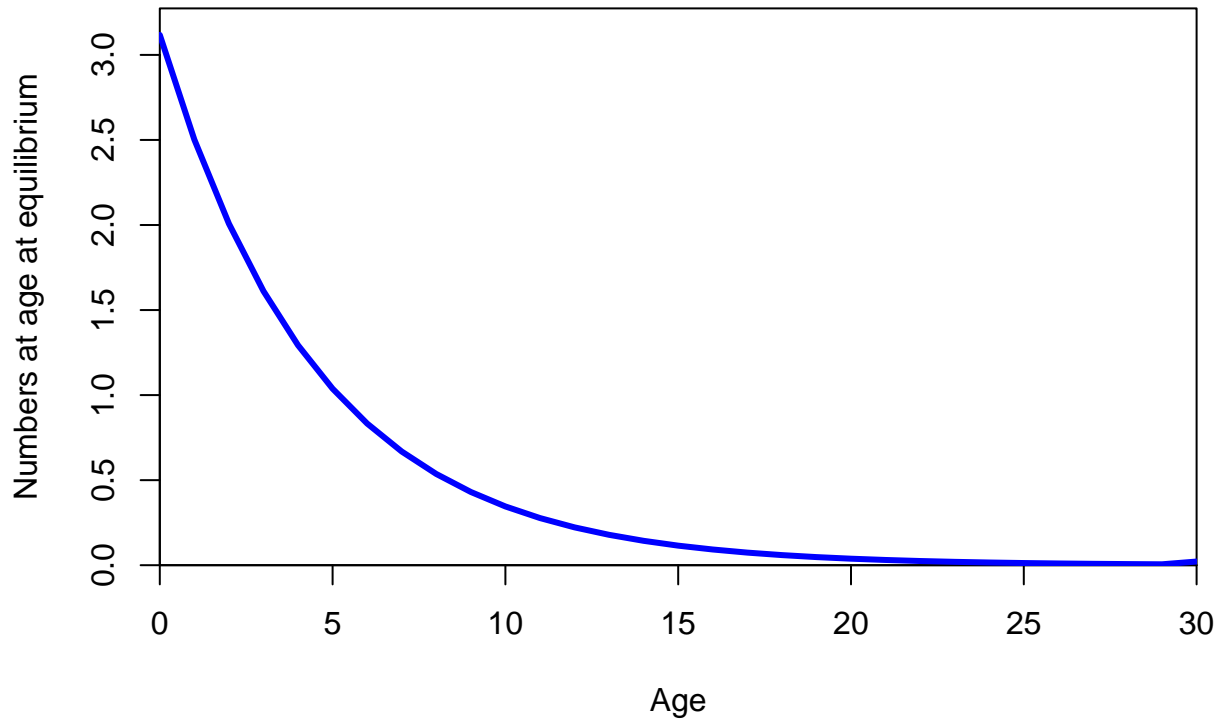
2010

2015

2020

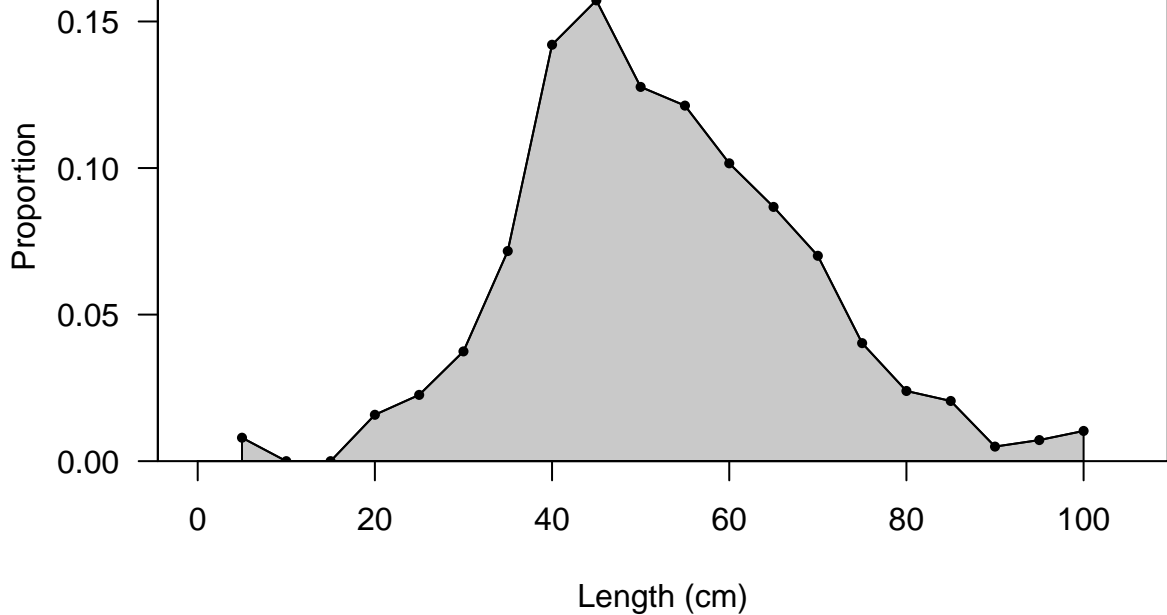
Year

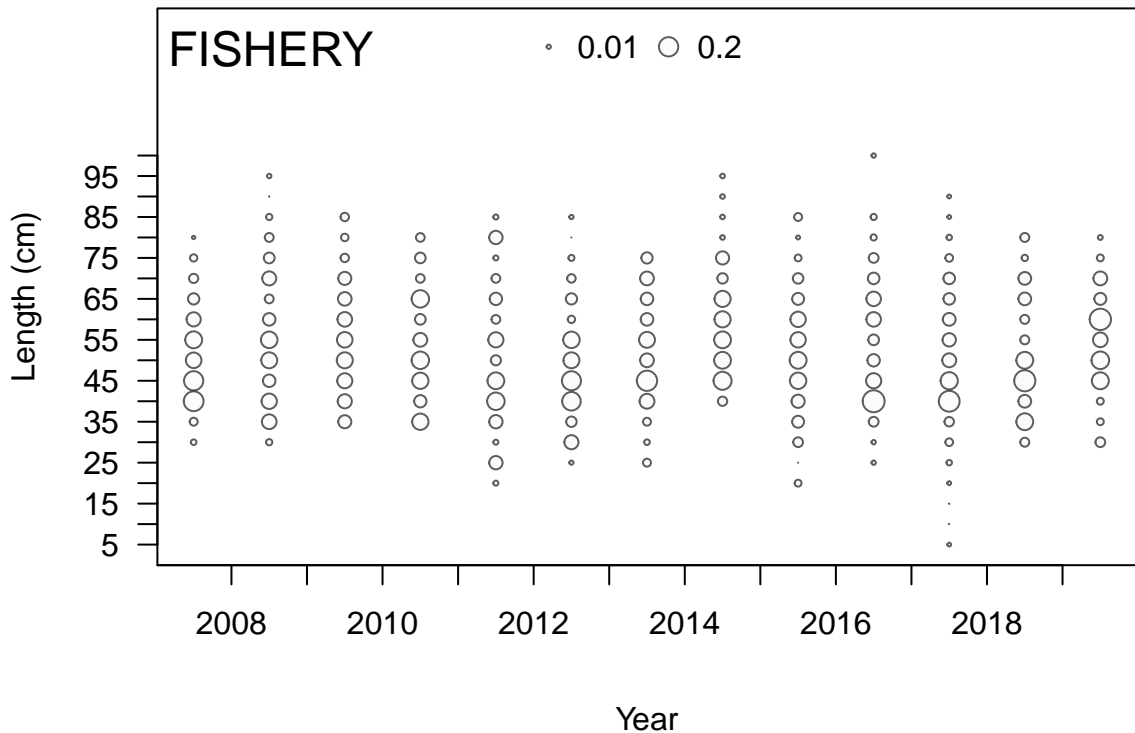




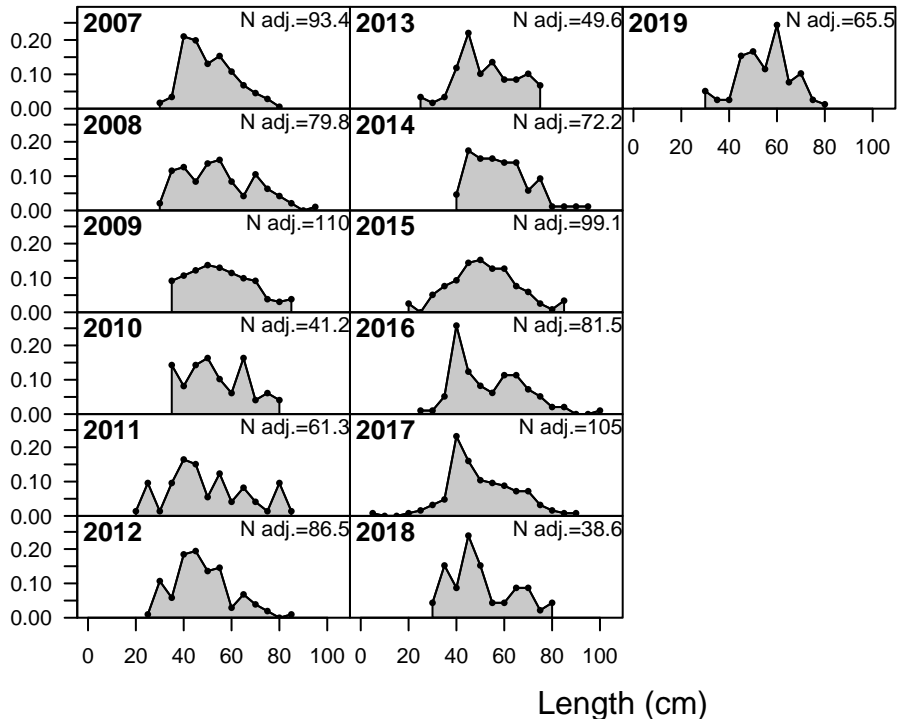
FISHERY

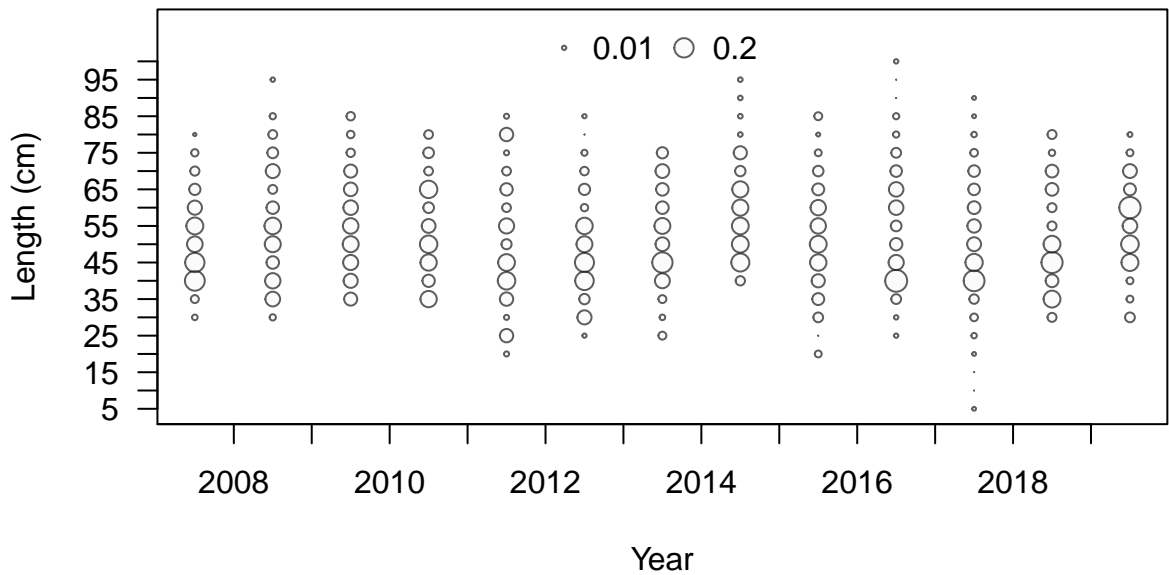
Sum of N adj.=983.8



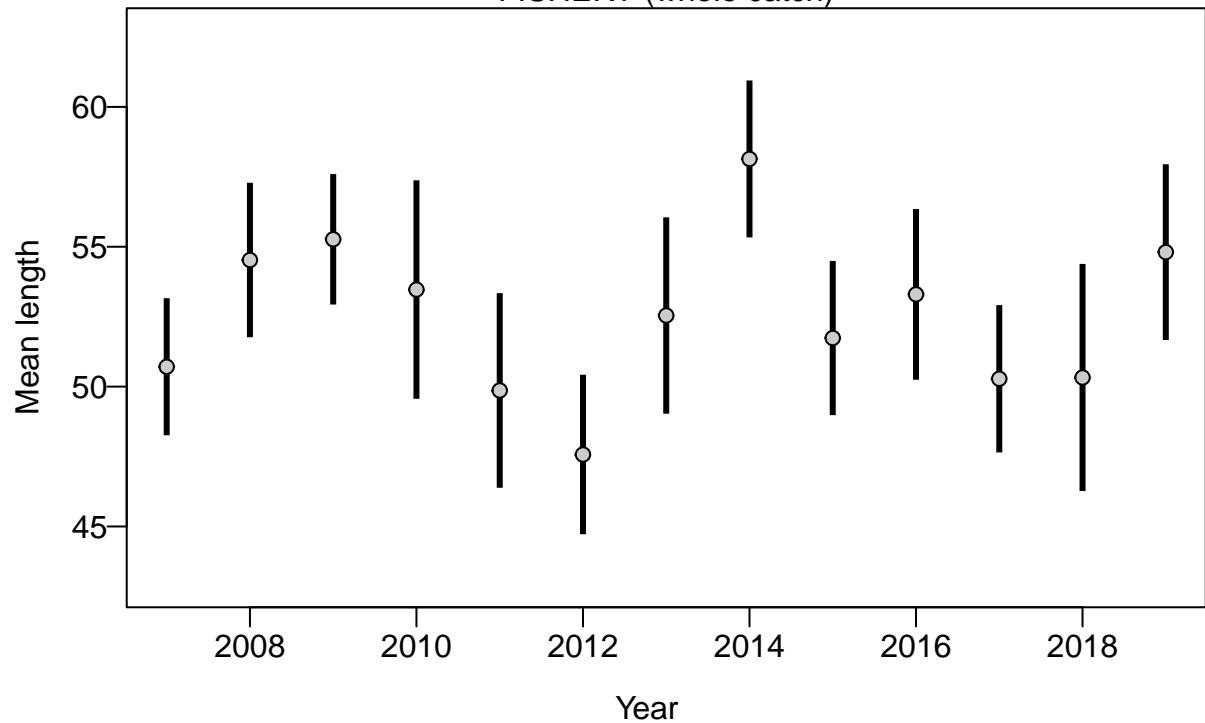


Proportion



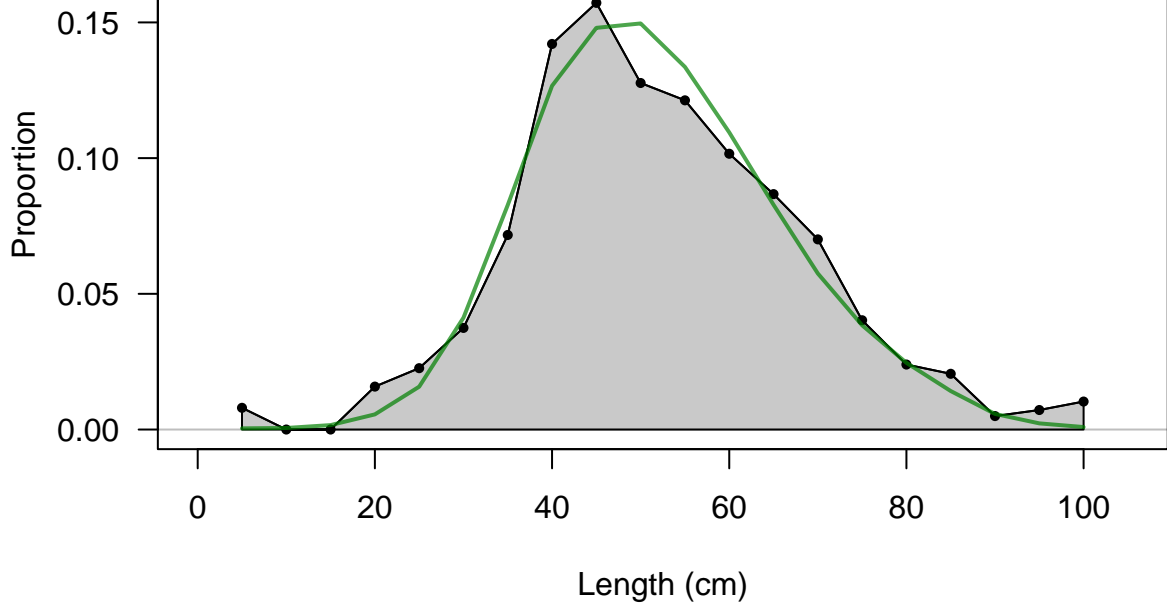


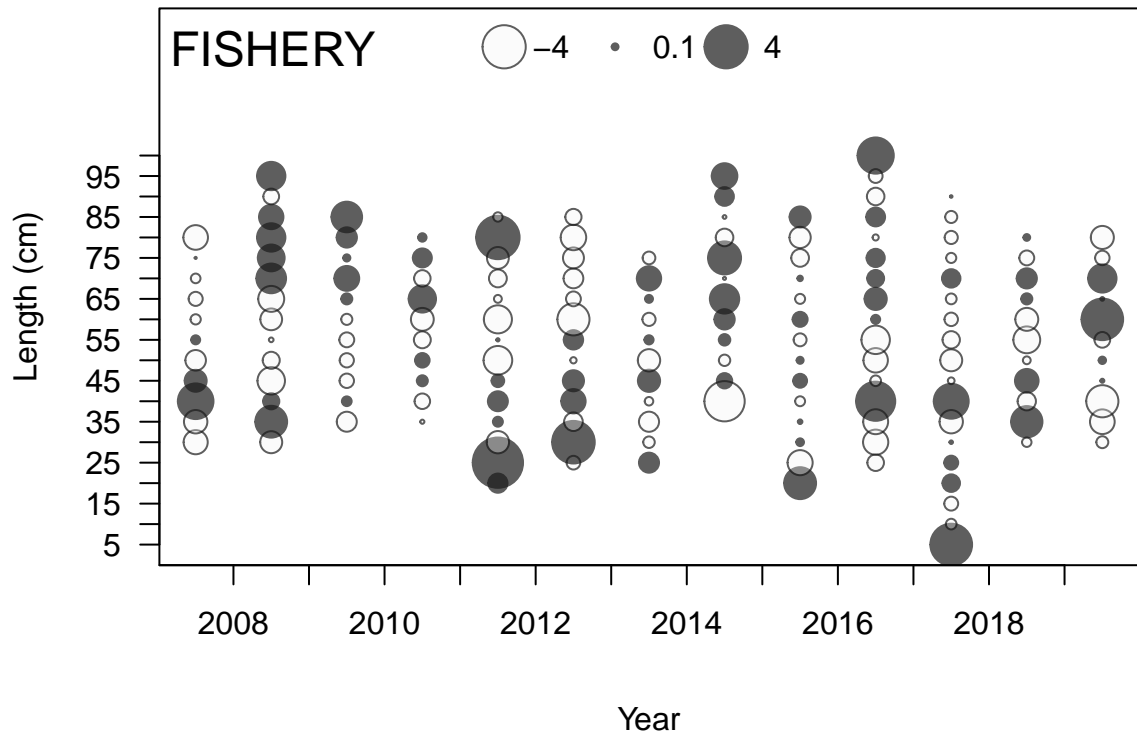
FISHERY (whole catch)



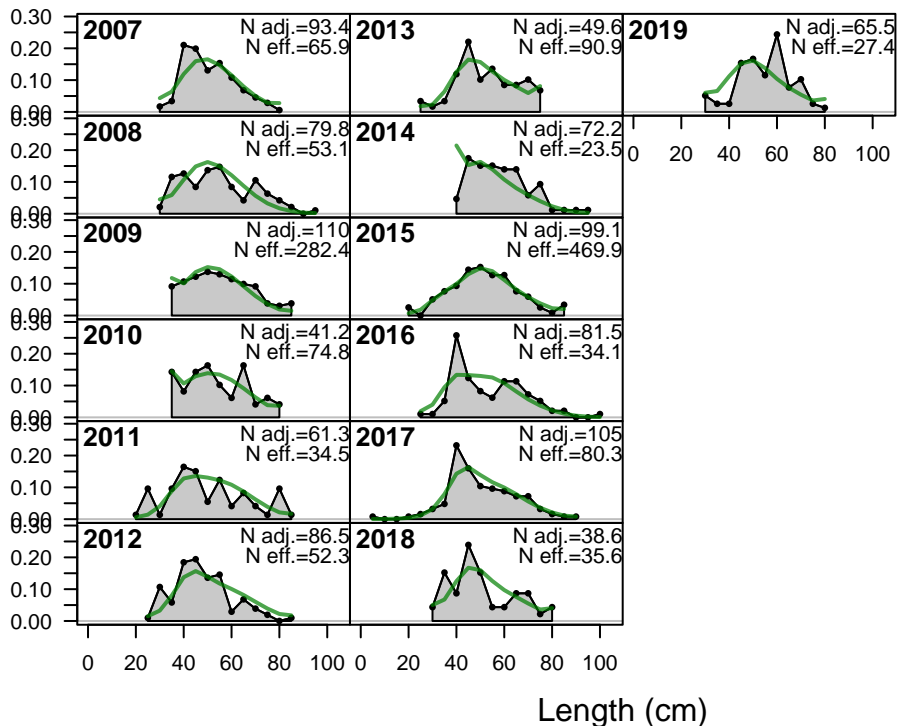
FISHERY

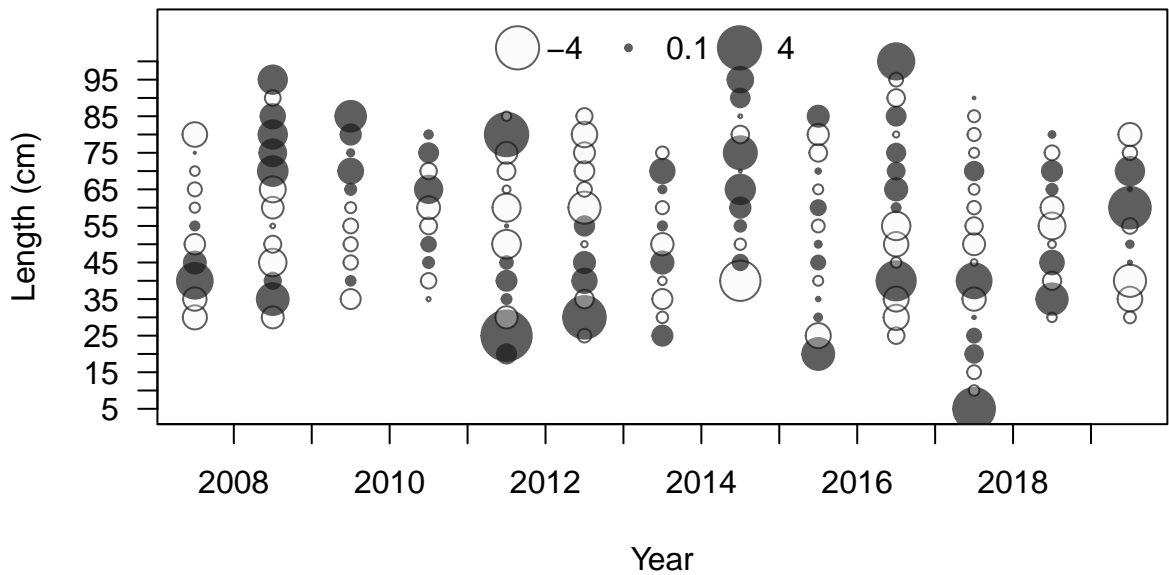
Sum of N adj.=983.8
Sum of N eff.=1324.6

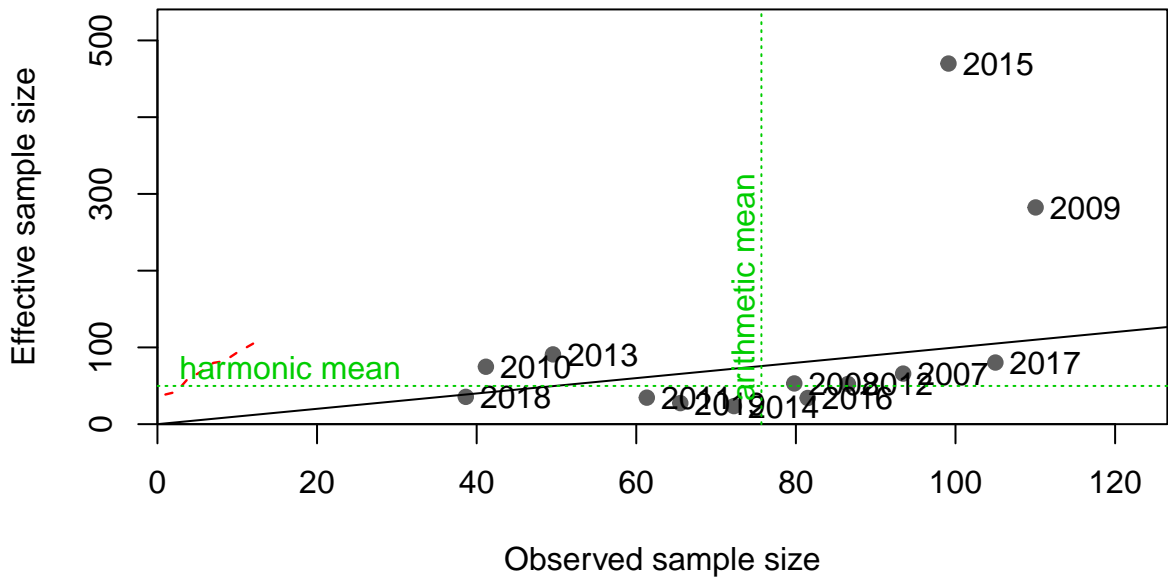




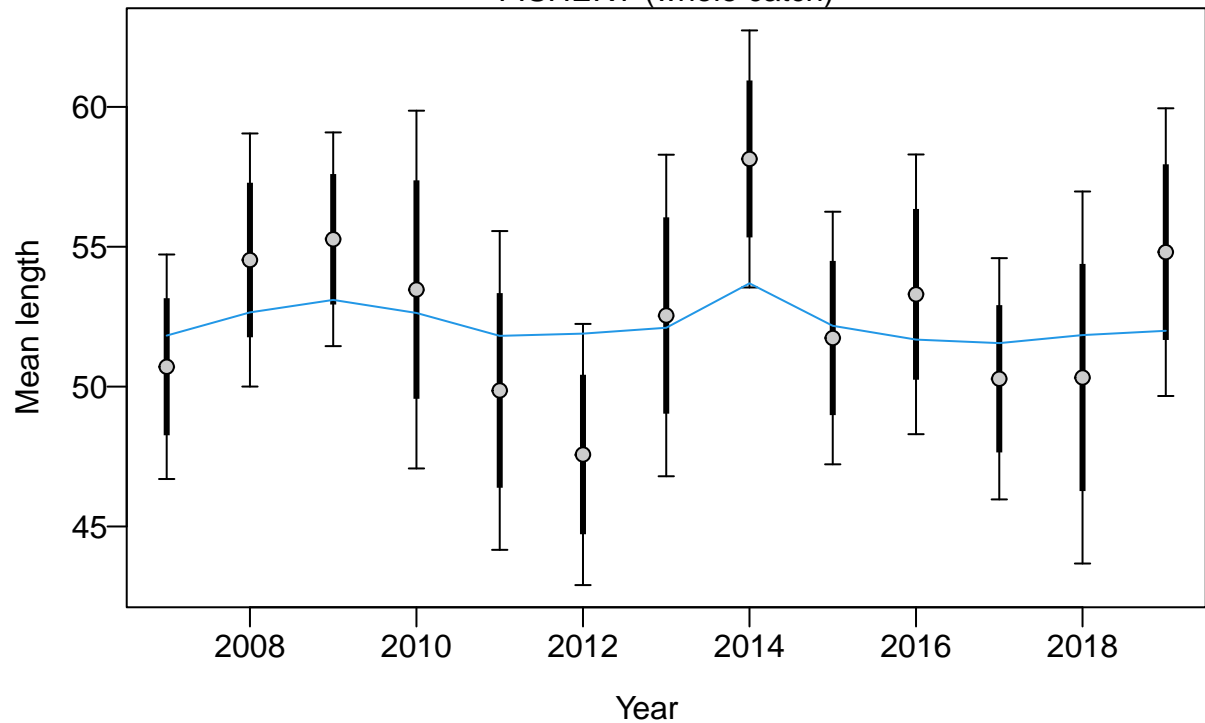
Proportion

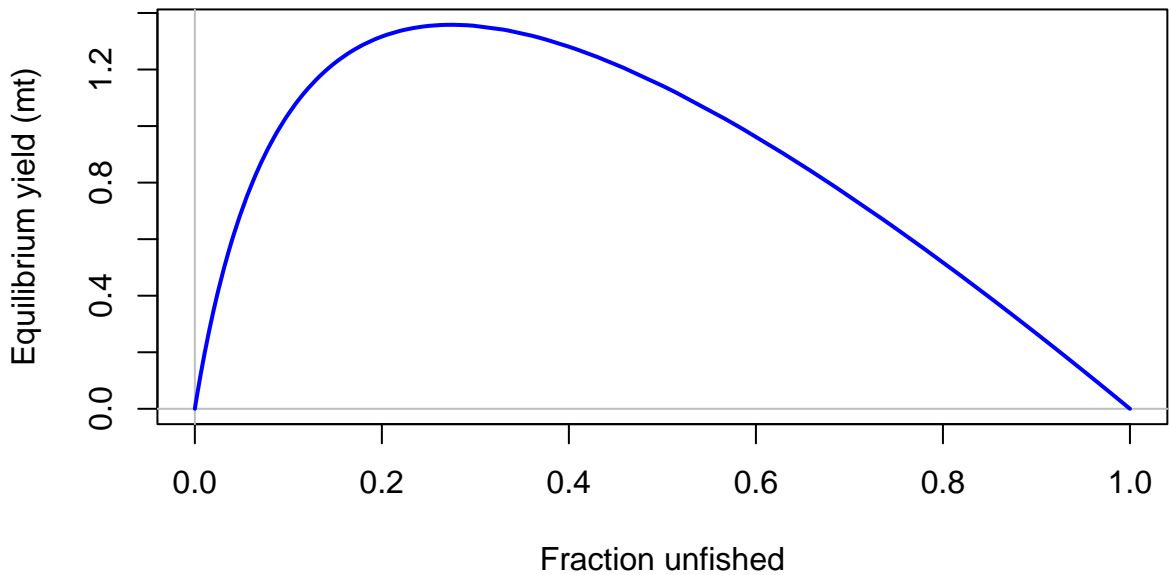


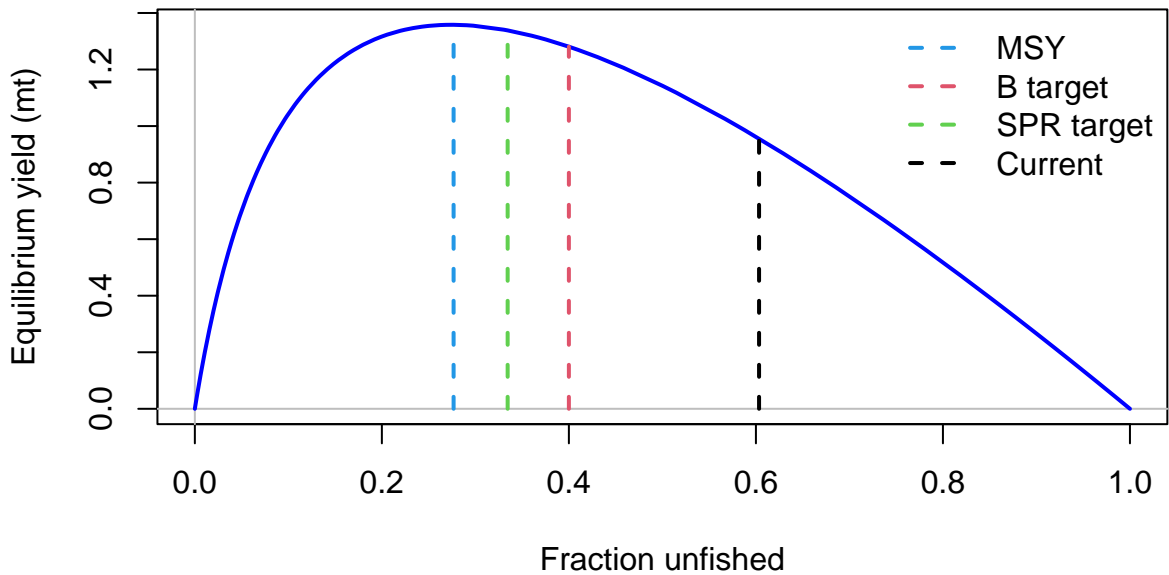


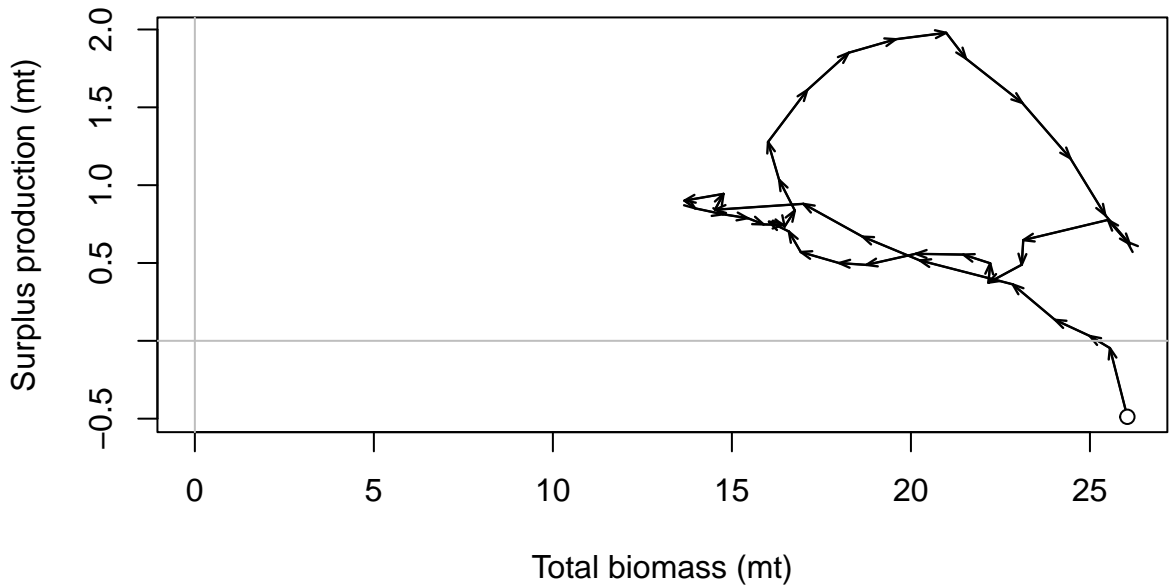


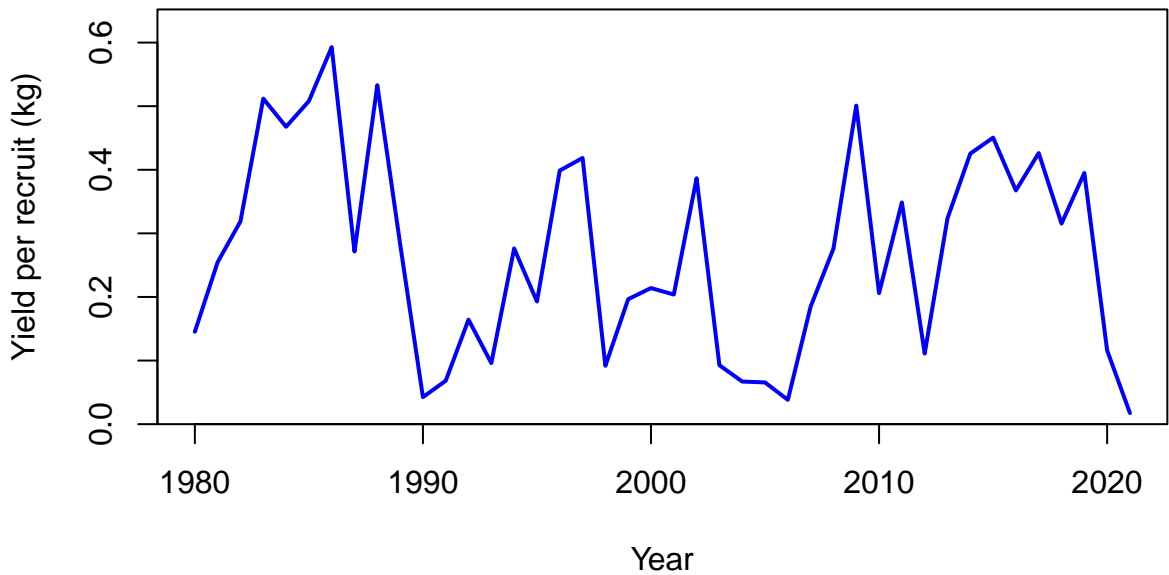
FISHERY (whole catch)

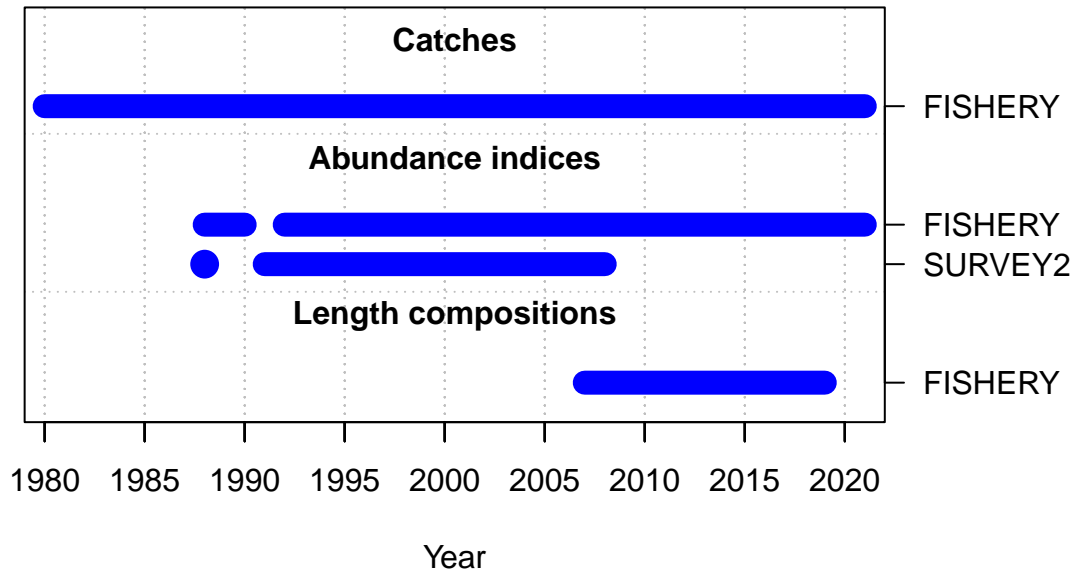


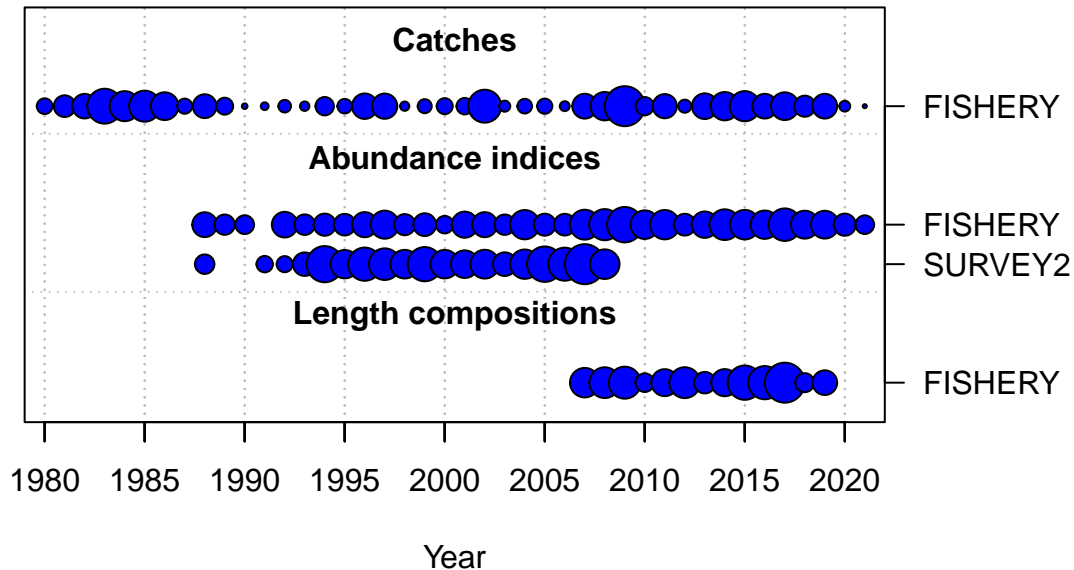




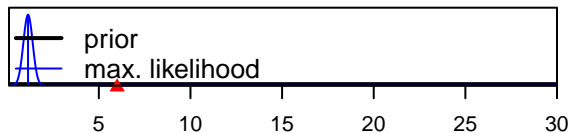




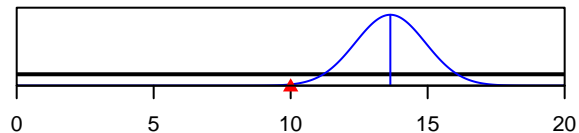




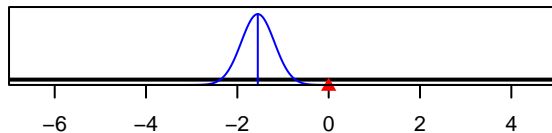
SR_LN(R0)



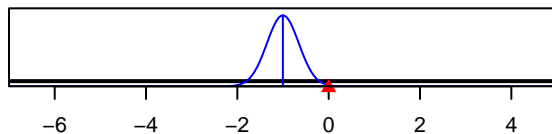
Size_95%width_FISHERY(1)



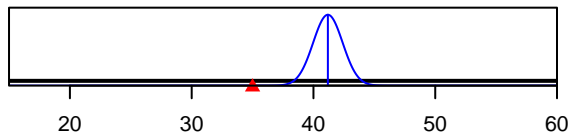
LnQ_base_FISHERY(1)



LnQ_base_SURVEY2(2)



Size_inflection_FISHERY(1)



Parameter value