

# New Biological Parameters for Bigeye Tuna



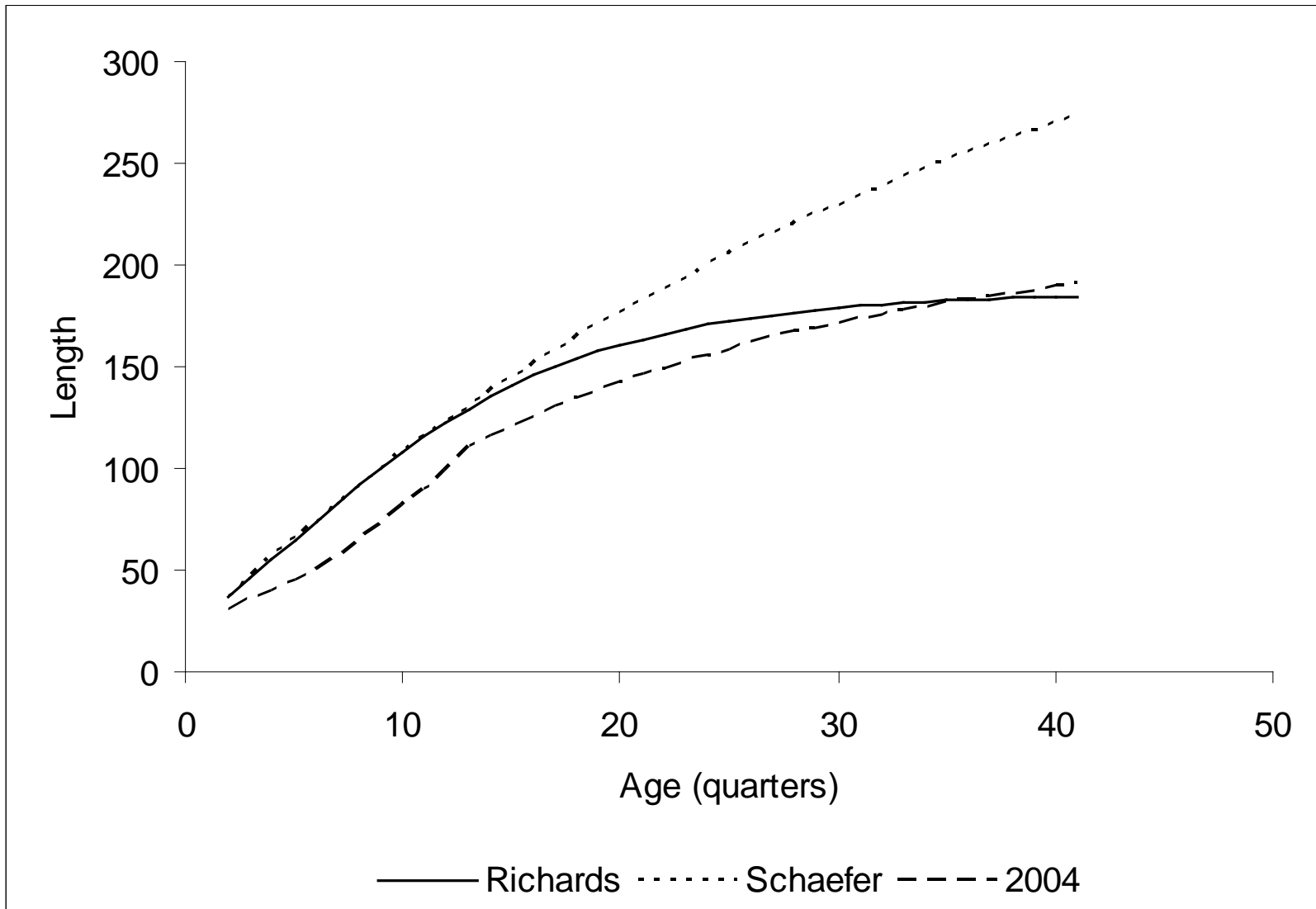
# New Biological Parameters

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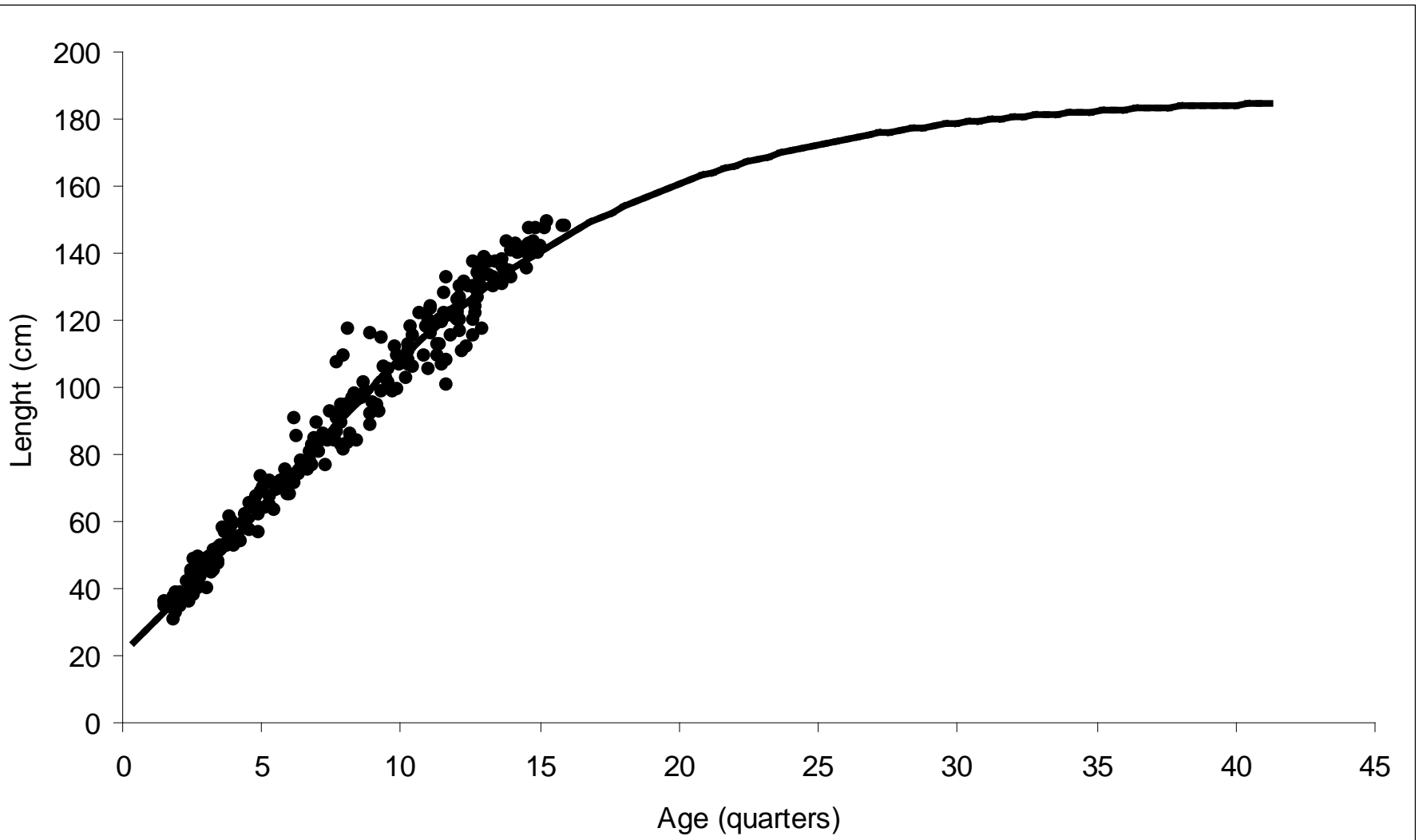
- Schaefer, K.M. and Fuller, D.W. (submitted a) Age and growth of bigeye tuna (*Thunnus obesus*) in the eastern Pacific Ocean based on otolith increments and tagging data. Submitted to: Inter-Amer. Trop. Tuna Comm., Bull.
- Schaefer, K.M. and Fuller, D.W. (submitted b) Reproductive biology of bigeye tuna (*Thunnus obesus*) from the eastern and central Pacific Ocean. Submitted to: Inter-Amer. Trop. Tuna Comm., Bull.



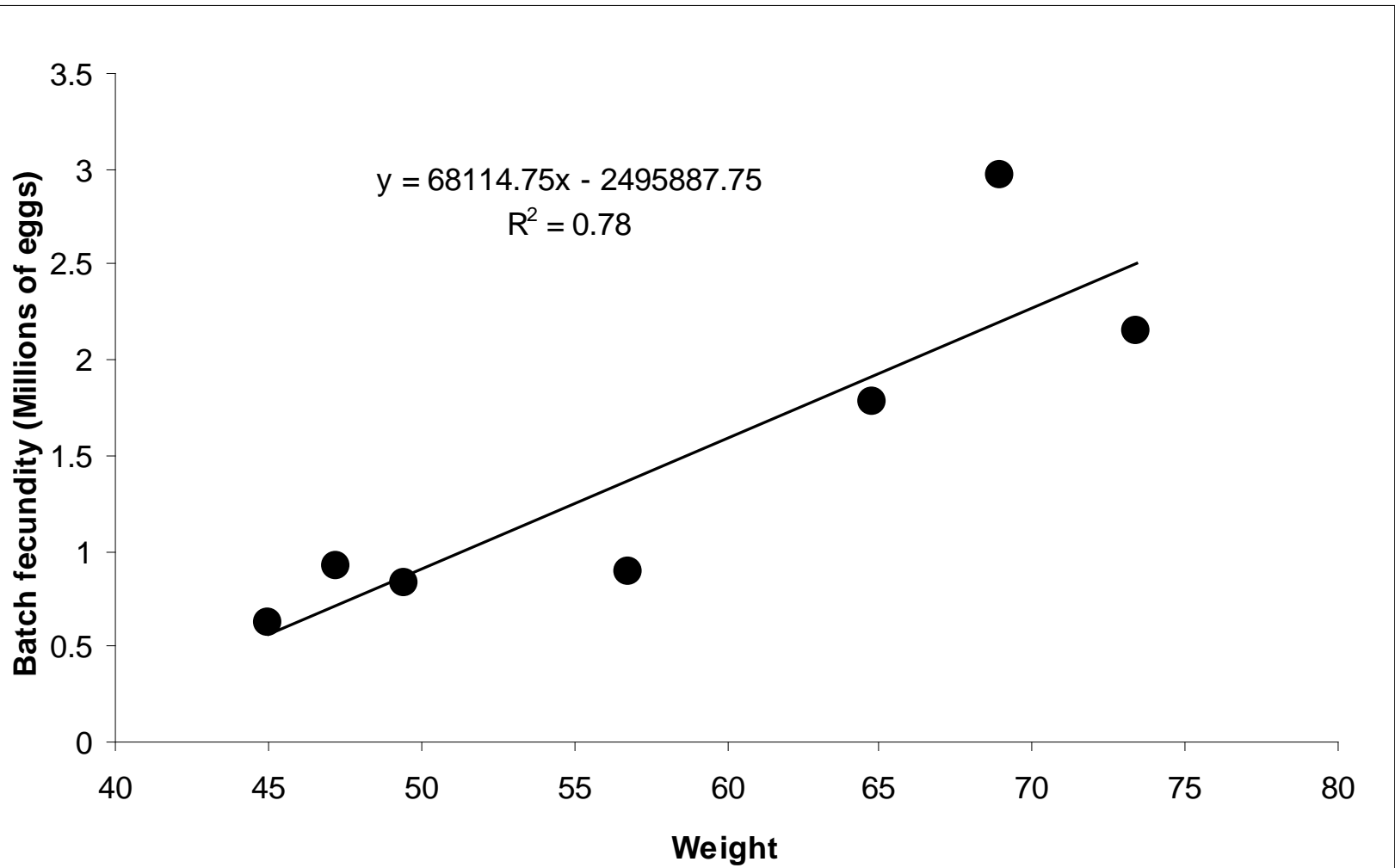
# Growth



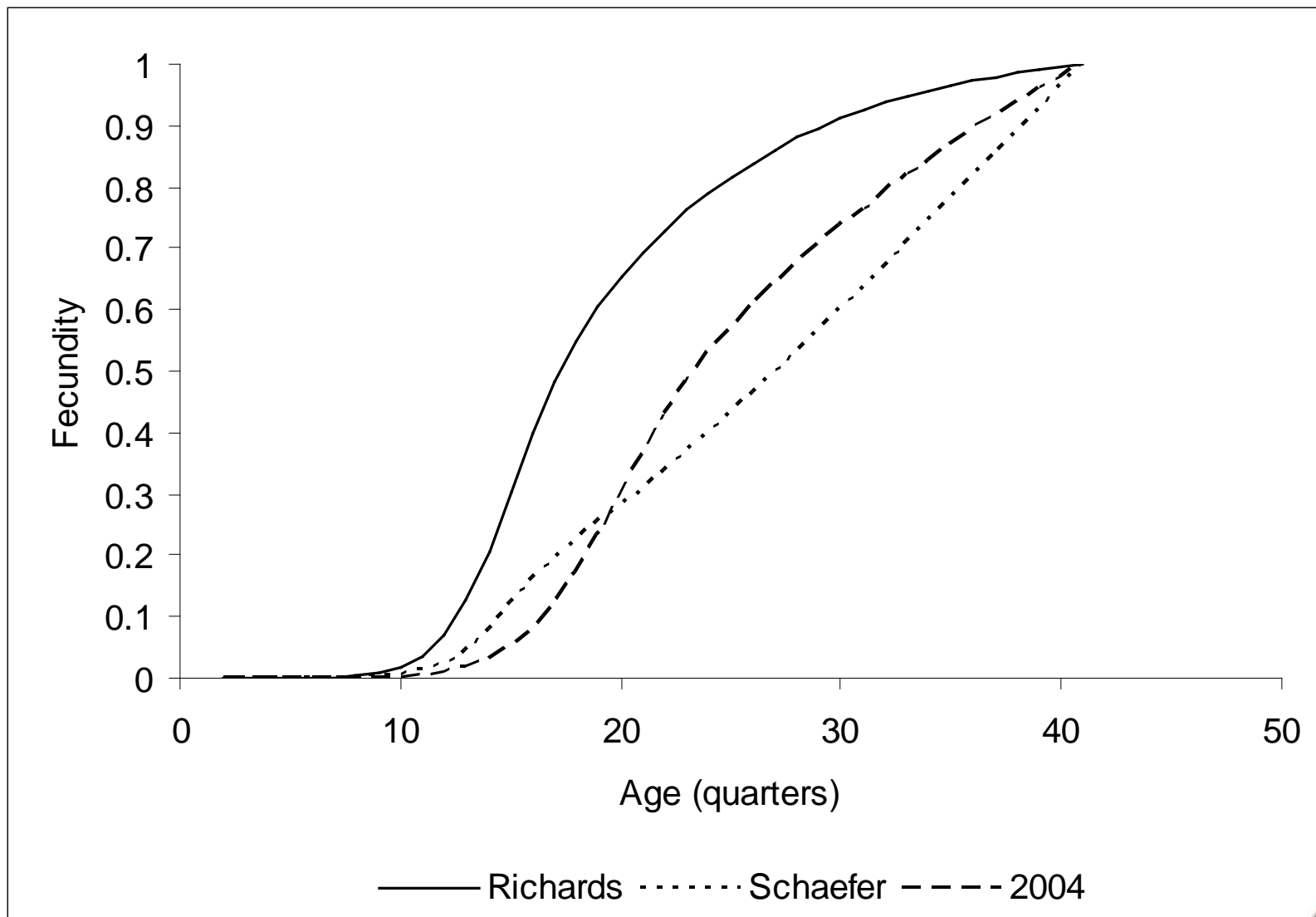
# Richards Curve



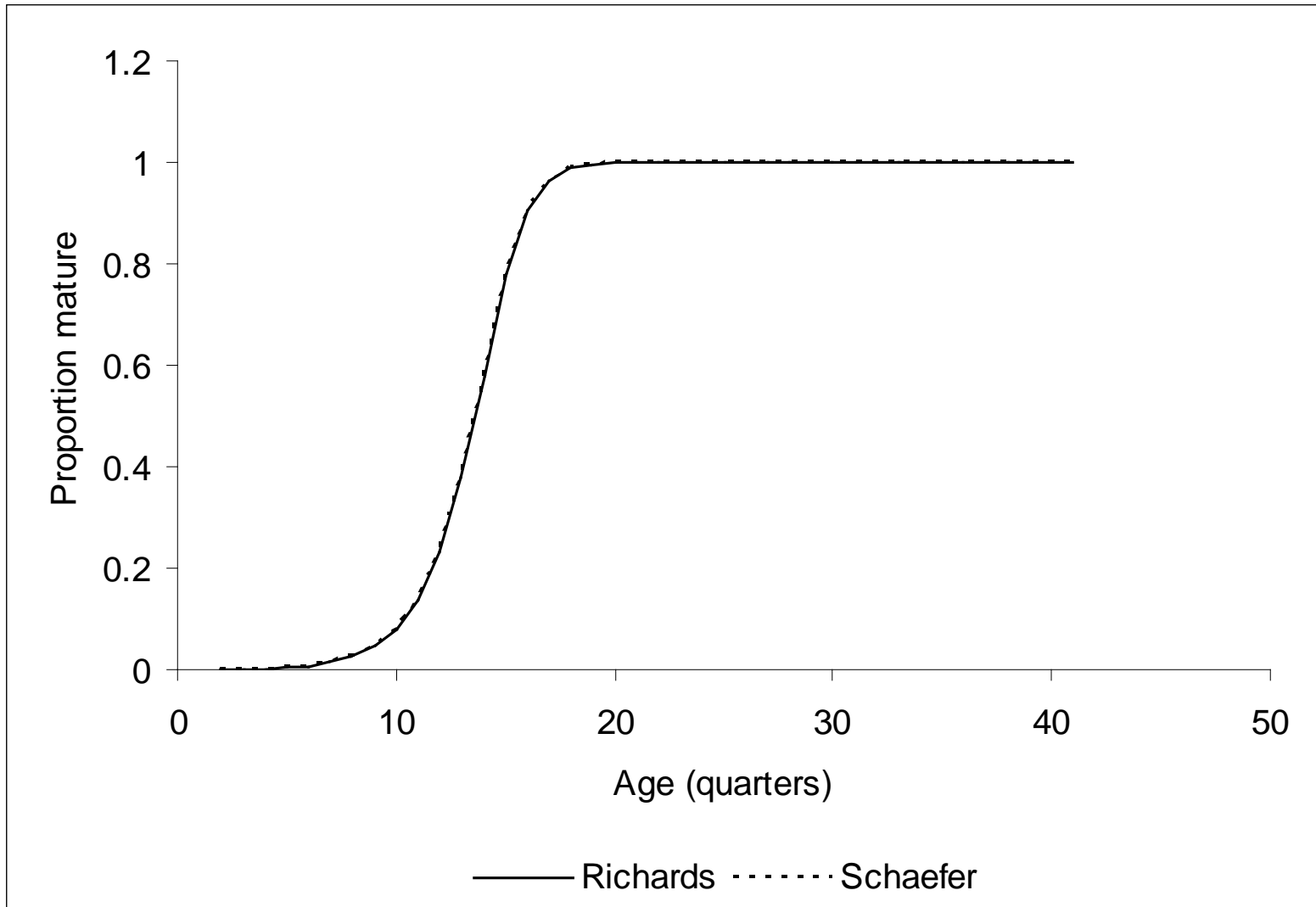
# Fecundity



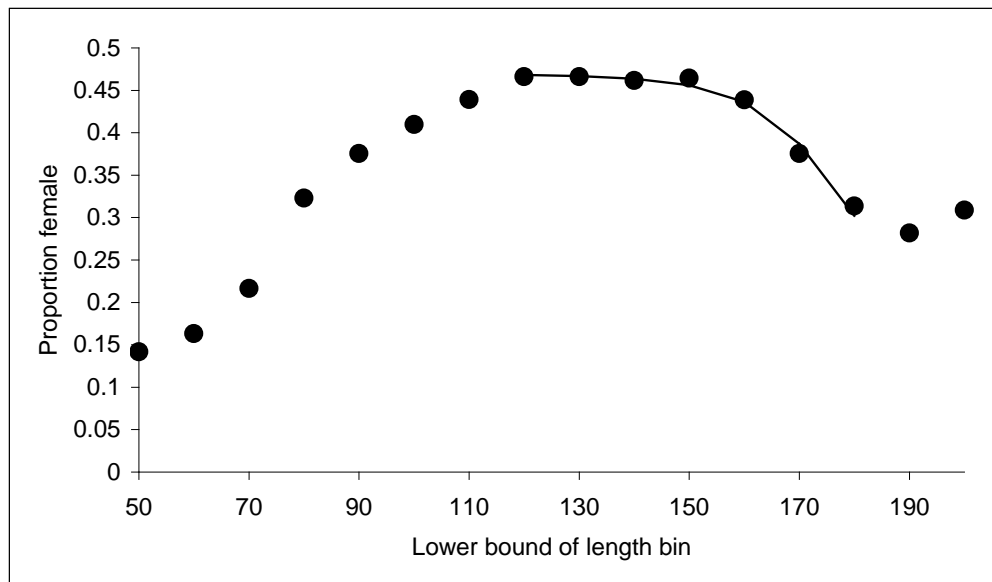
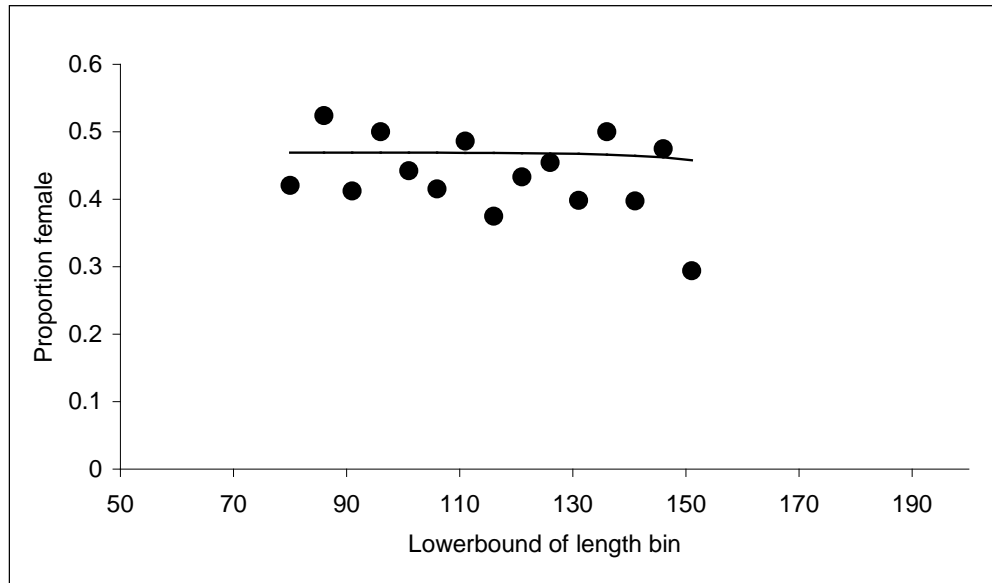
# Fecundity



# Maturity

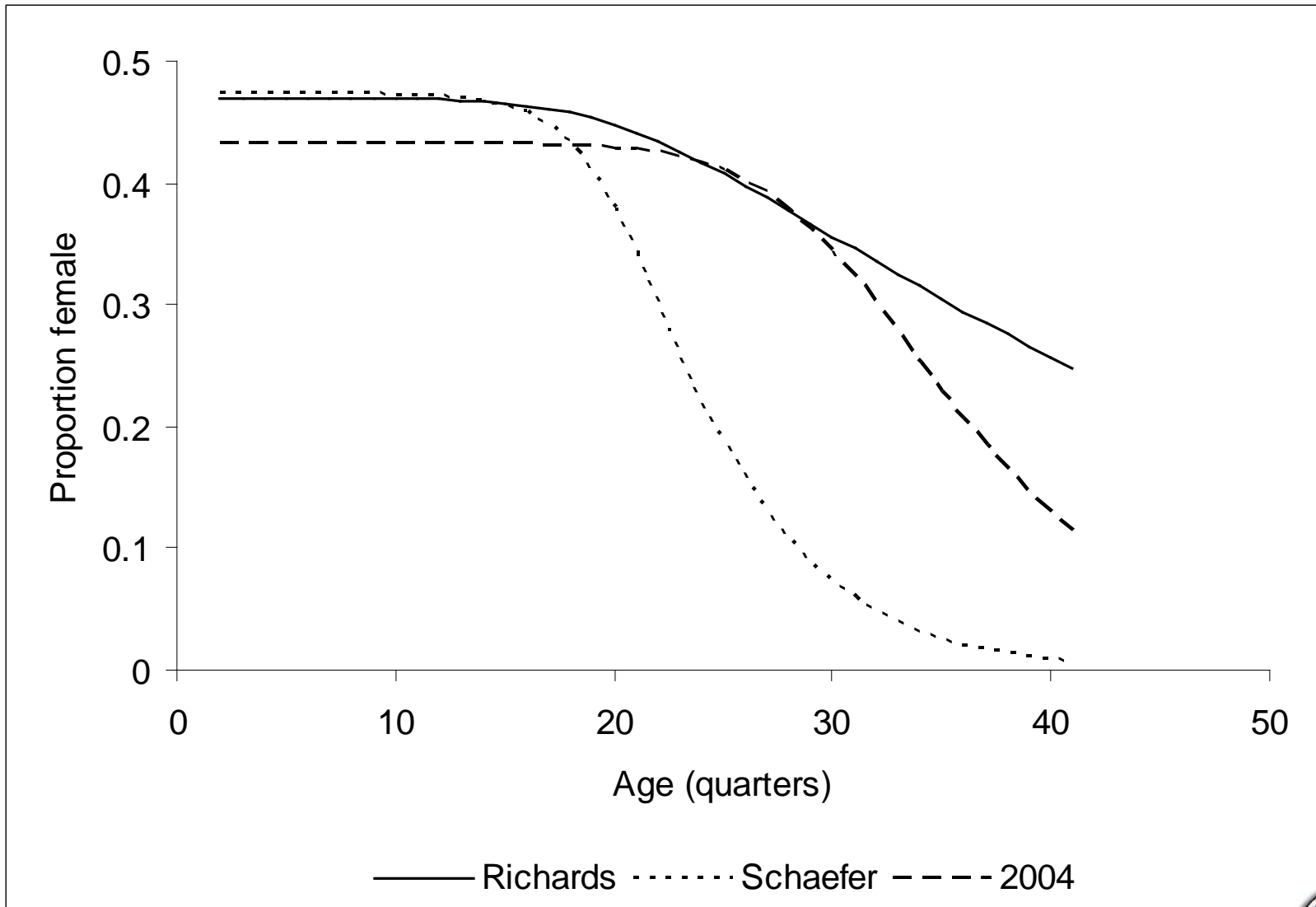


# Proportion Female

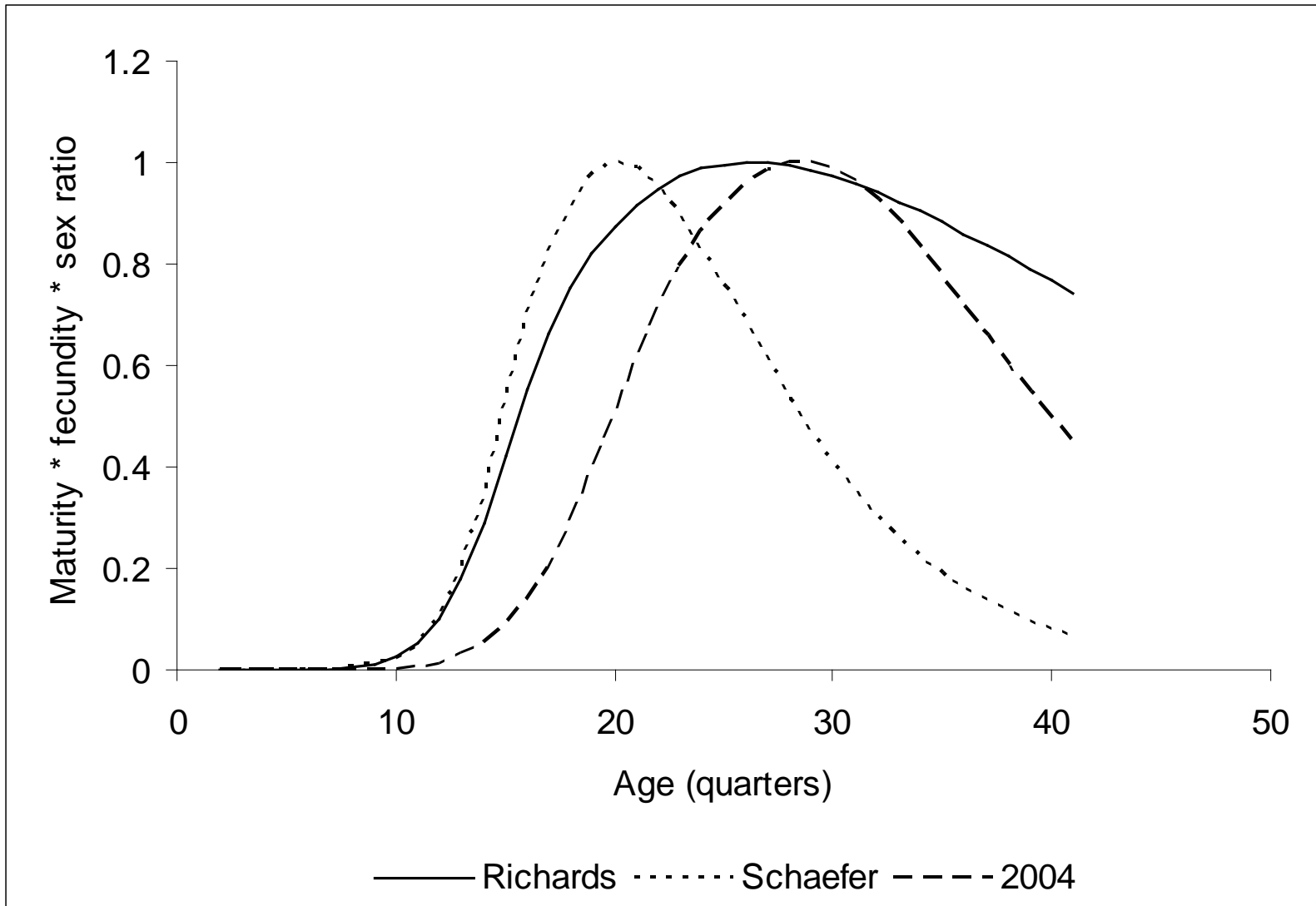




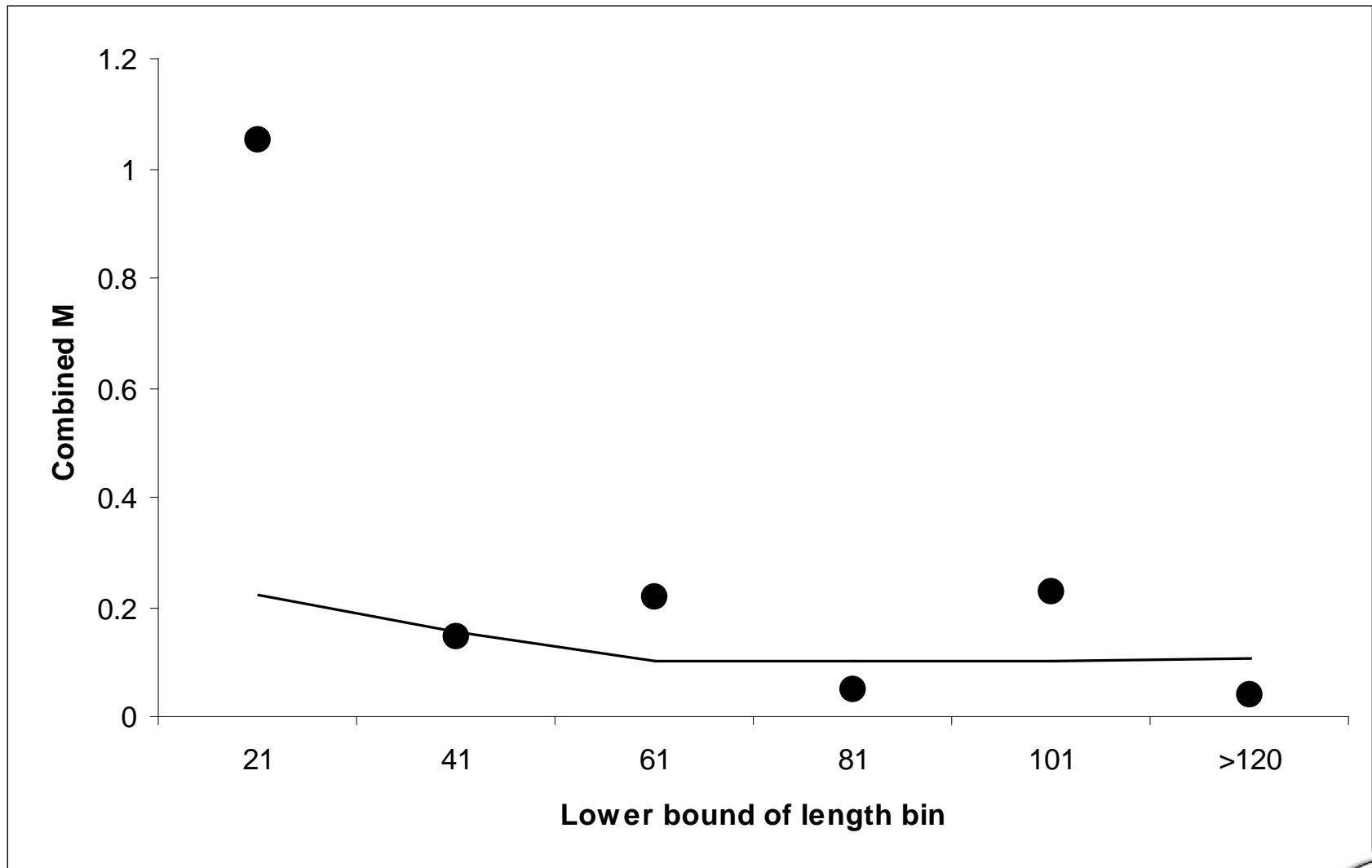
# Proportion Female



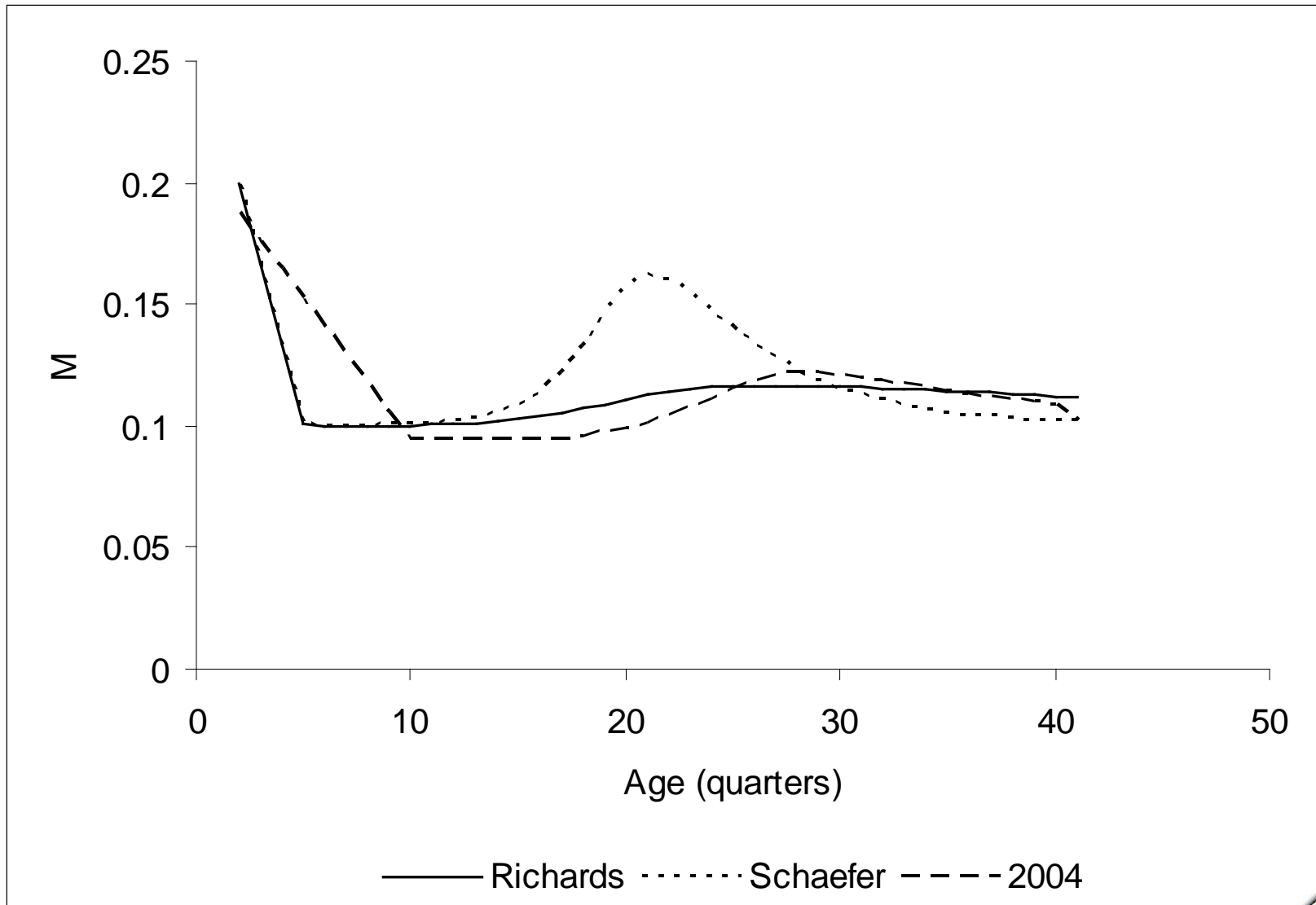
# Spawning Biomass Contribution



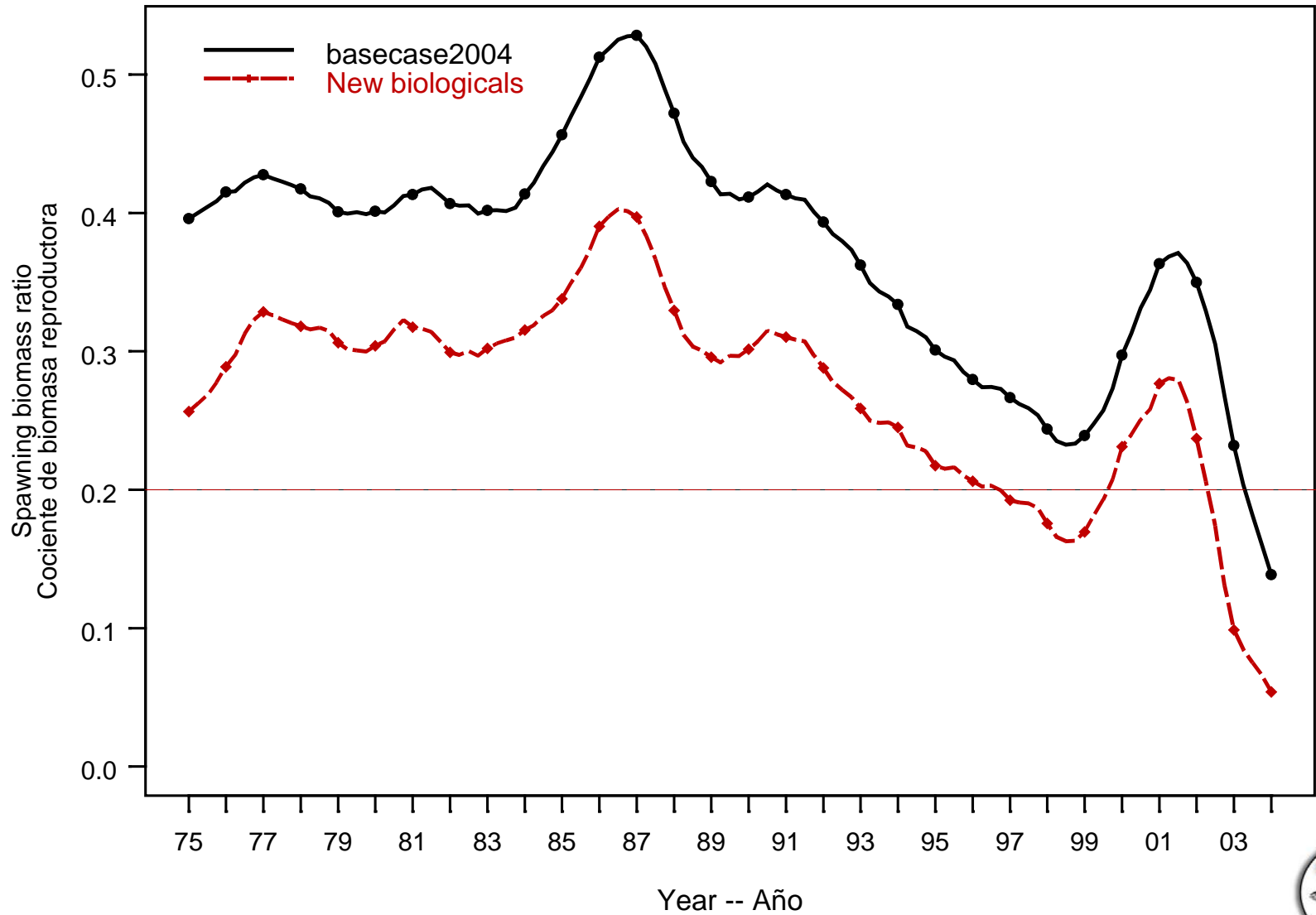
# Fit to Hampton's Natural Mortality Estimates



# Natural Mortality



# SBR



# Management Parameters

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Quantity	2004 assessment	New Biologicals
MSY	77747	81359
Bmsy/B0	0.28	0.29
Smsy/S0	0.20	0.20
Ccur/MSY	1.26	1.01
Bcur/Bmsy	0.57	0.28
Scur/Smsy	0.68	0.27
Fscale	0.62	0.48
Bcur/B0	0.16	0.08
Scur/S0	0.14	0.05

