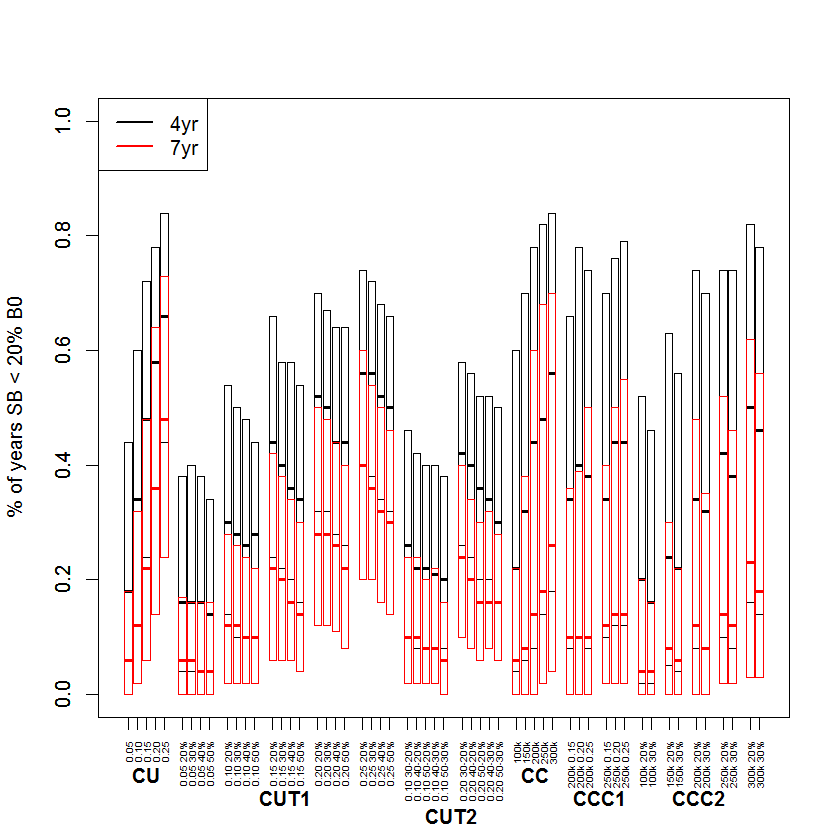
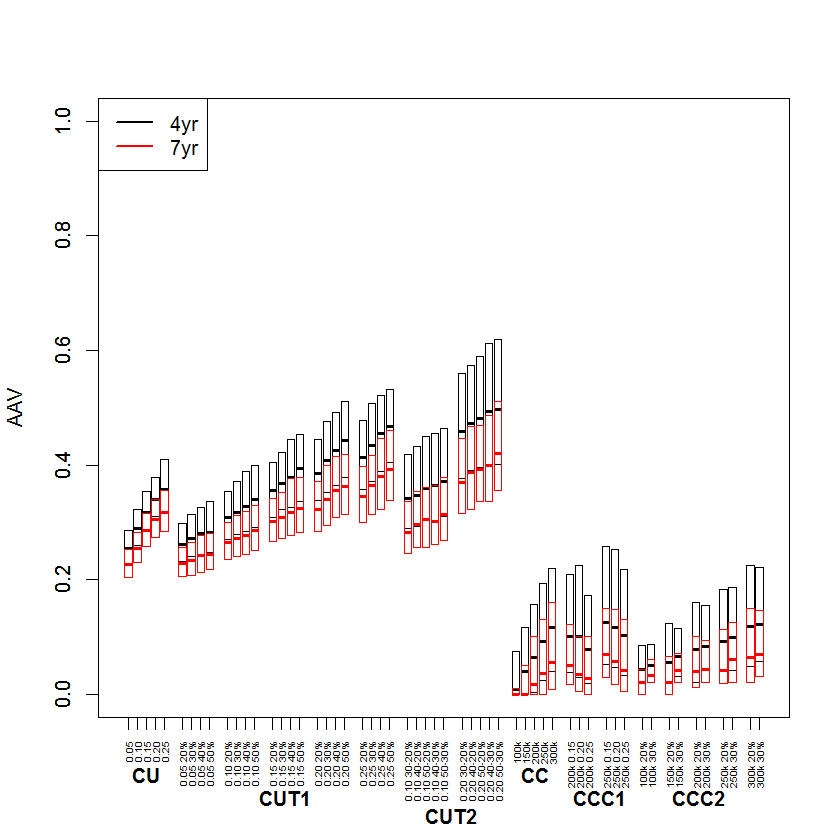


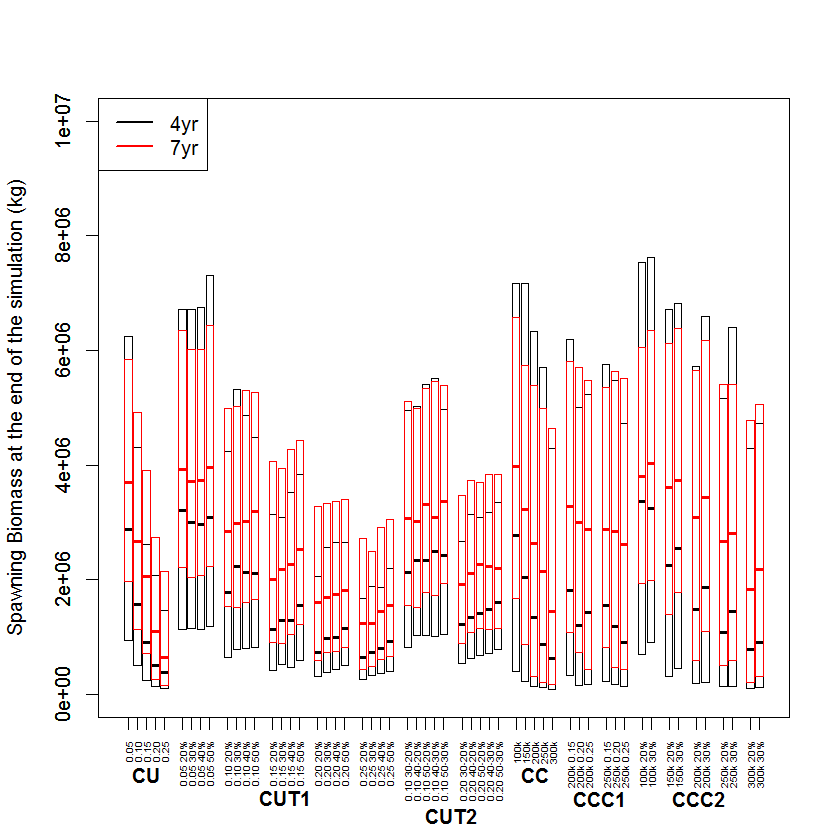
Supplemental Figure 2.1. Summary of the distributions of average harvest per year for the simulation period (50 yrs). Red boxplots depict 7yr recruitment scenario and black boxplots depict 4yr recruitment scenario. Shown are medians (horizontal bars) and 25-75 quantiles (boxes).



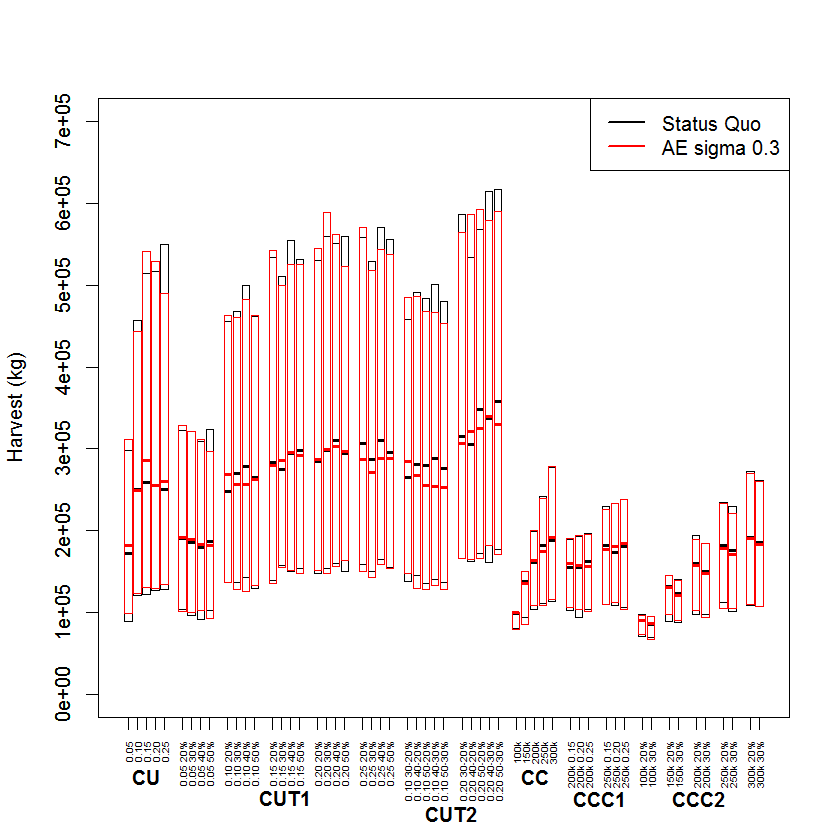
Supplemental Figure 2.2. Summary of the distributions of the percent of years the spawning biomass is below 20% of the unfished level for the simulation period (50 yrs). Red boxplots depict 7yr recruitment scenario and black boxplots depict 4yr recruitment scenario. Shown are medians (horizontal bars) and 25-75 quantiles (boxes).



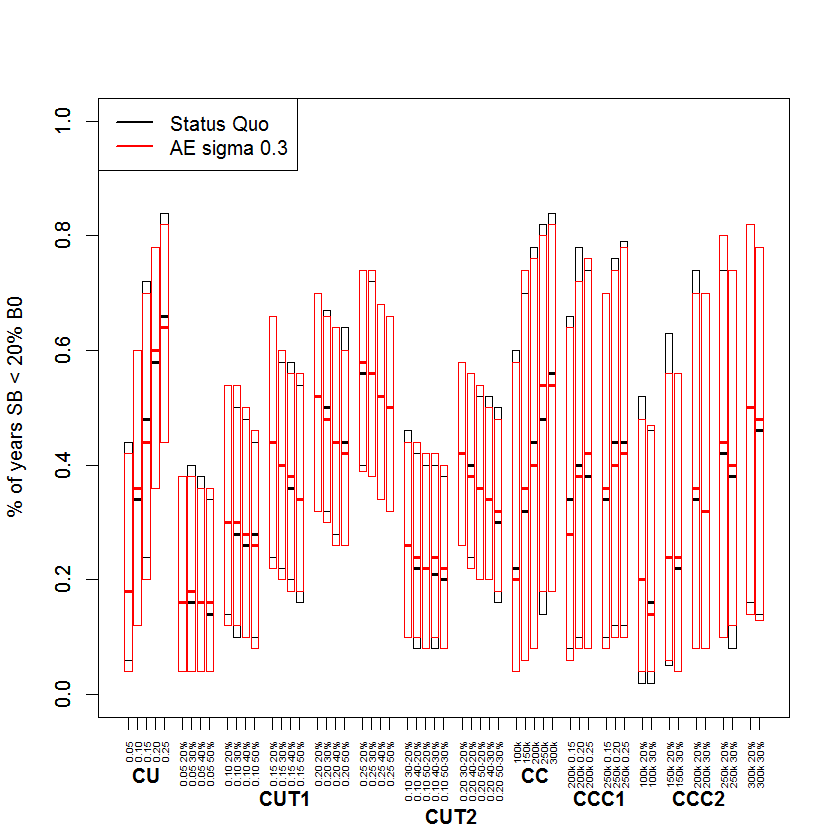
Supplemental Figure 2.3. Summary of the distributions of absolute annual variation in yield for the simulation period (50 yrs). Red boxplots depict 7yr recruitment scenario and black boxplots depict 4yr recruitment scenario. Shown are medians (horizontal bars) and 25-75 quantiles (boxes).



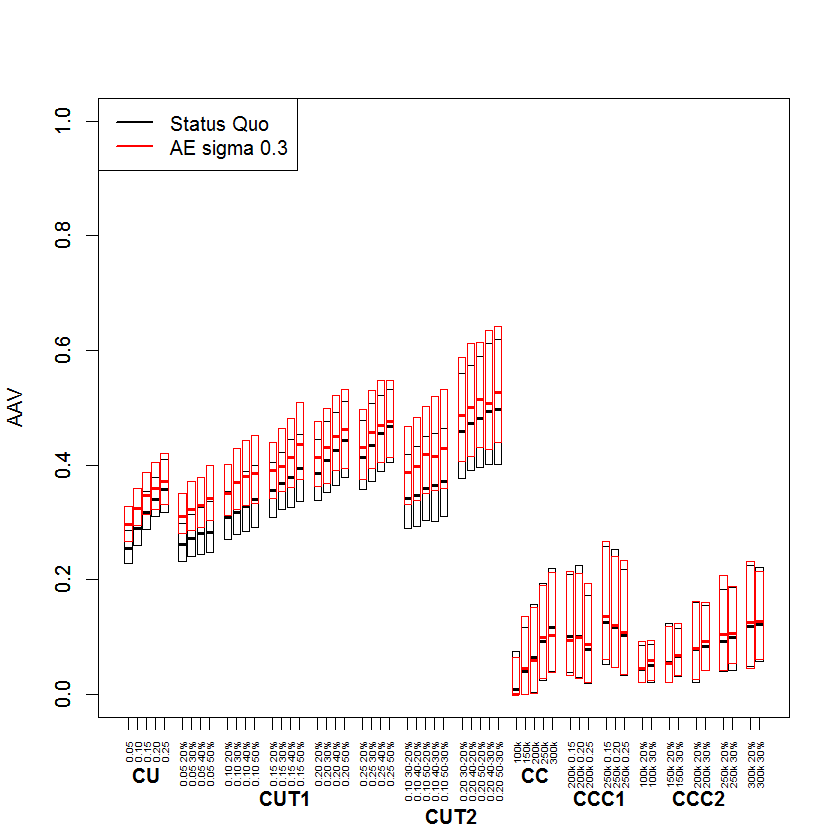
Supplemental Figure 2.4. Summary of the distributions of spawning biomass at the end of the simulation period (50 yrs). Red boxplots depict 7yr recruitment scenario and black boxplots depict 4yr recruitment scenario. Shown are medians (horizontal bars) and 25-75 quantiles (boxes).



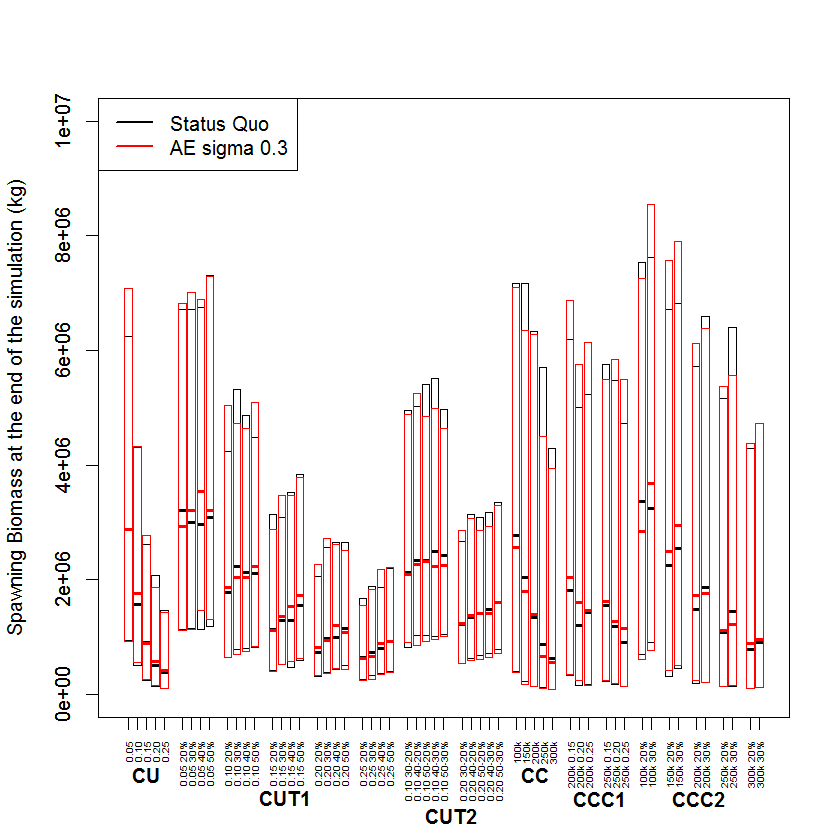
Supplemental Figure 2.5. Summary of the distributions of average harvest per year for the simulation period (50 yrs) for the 4yr recruitment scenario. Plot depicts two scenarios regarding assessment error. In red is a scenario where . In black is the “status quo” scenario where . Shown are medians (horizontal bars) and 25-75 quantiles (boxes).



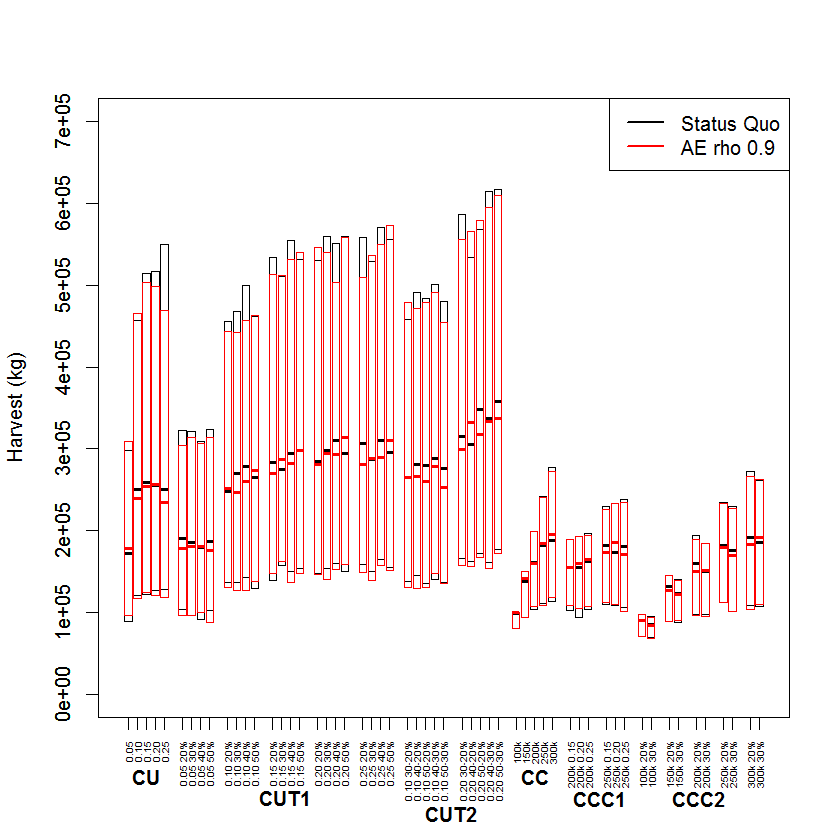
Supplemental Figure 2.6. Summary of the distributions of the percent of years spawning biomass is below 20% of the unfished level for the 4yr recruitment scenario. Plot depicts two scenarios regarding assessment error. In red is a scenario where. In black is the “status quo” scenario where . Shown are medians (horizontal bars) and 25-75 quantiles (boxes).



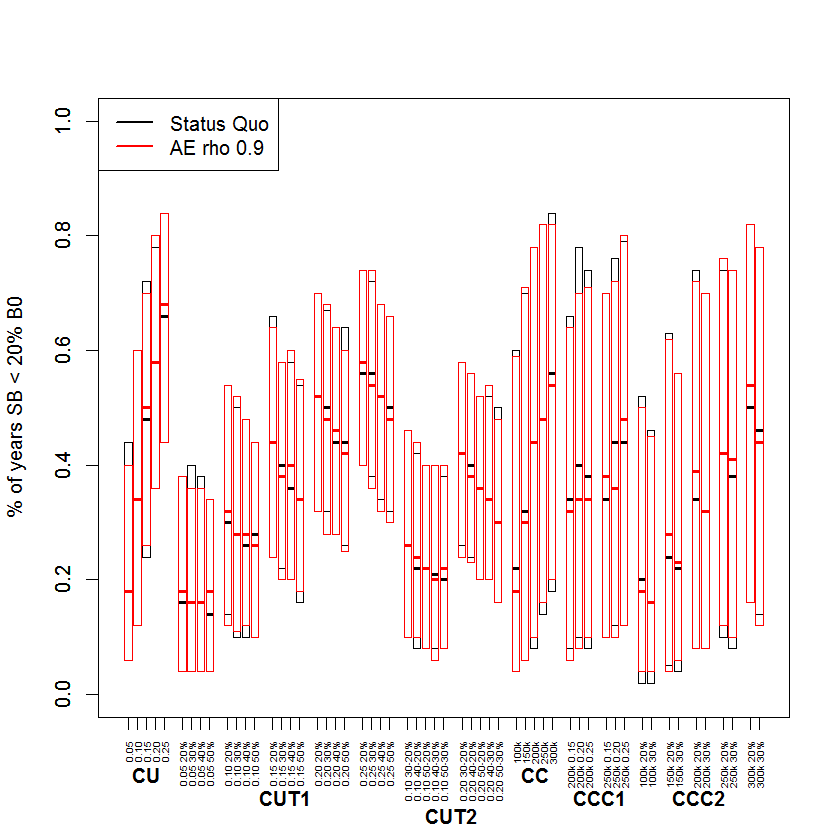
Supplemental Figure 2.7. Summary of the distributions of absolute annual variation in yield for the simulation period (50 yrs) for the 4yr recruitment scenario. Plot depicts two scenarios regarding assessment error. In red is a scenario where . In black is the “status quo” scenario where . Shown are medians (horizontal bars) and 25-75 quantiles (boxes).



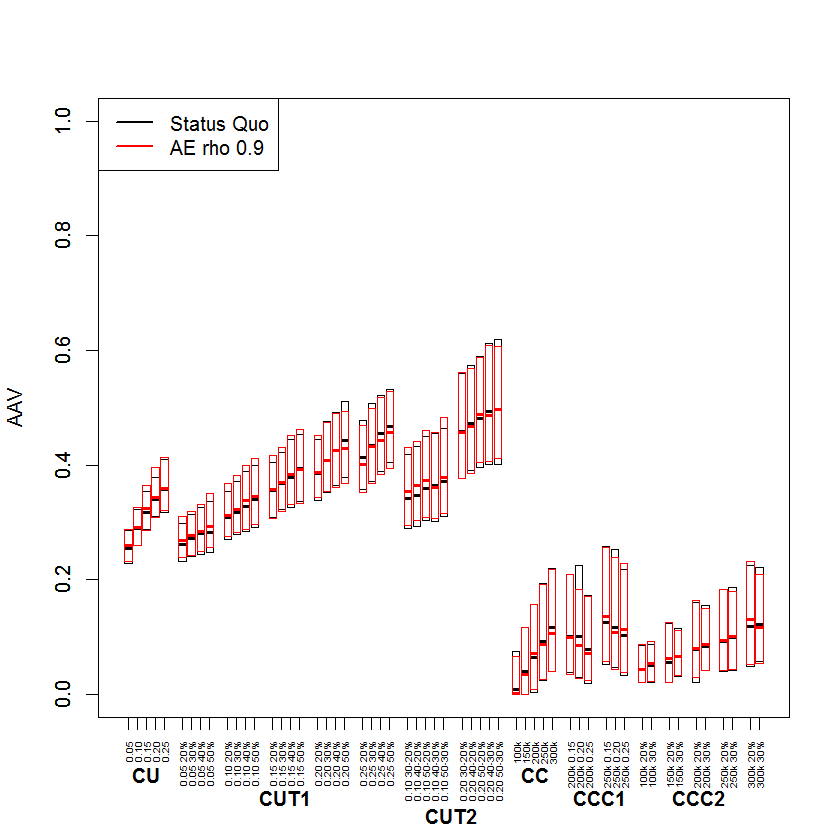
Supplemental Figure 2.8. Summary of the distributions of spawning biomass at the end of the simulation period (50 yrs) for the 4yr recruitment scenario. Plot depicts two scenarios regarding assessment error. In red is a scenario where . In black is the “status quo” scenario where . Shown are medians (horizontal bars) and 25-75 quantiles (boxes).



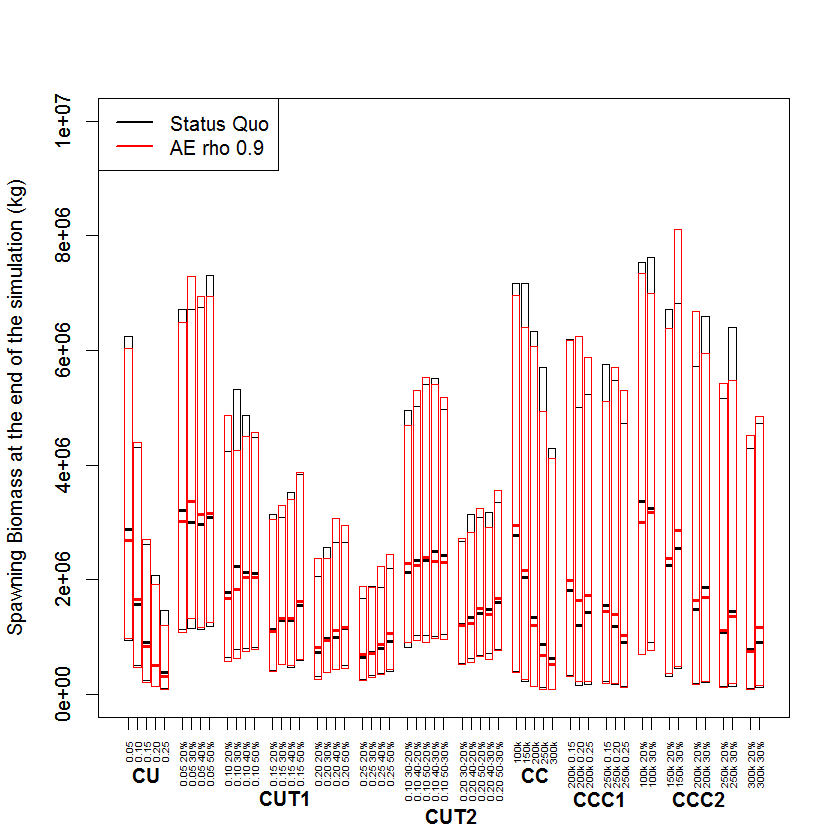
Supplemental Figure 2.9. Summary of the distributions of average harvest per year for the simulation period (50 yrs) for the 4yr recruitment scenario. Plot depicts two scenarios regarding assessment error. In red is a scenario where . In black is the “status quo” scenario where . Shown are medians (horizontal bars) and 25-75 quantiles (boxes).



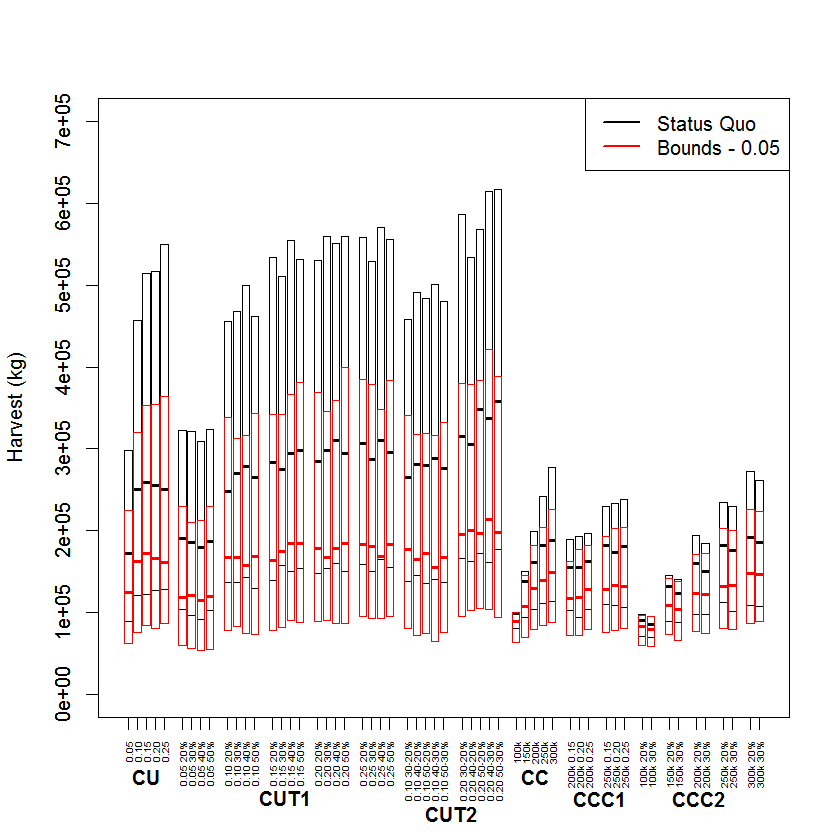
Supplemental Figure 2.10. Summary of the distributions of the percent of years where spawning biomass is below 20% of the unfished level for the 4yr recruitment scenario. Plot depicts two scenarios regarding assessment error. In red is a scenario where . In black is the “status quo” scenario where . Shown are medians (horizontal bars) and 25-75 quantiles (boxes).



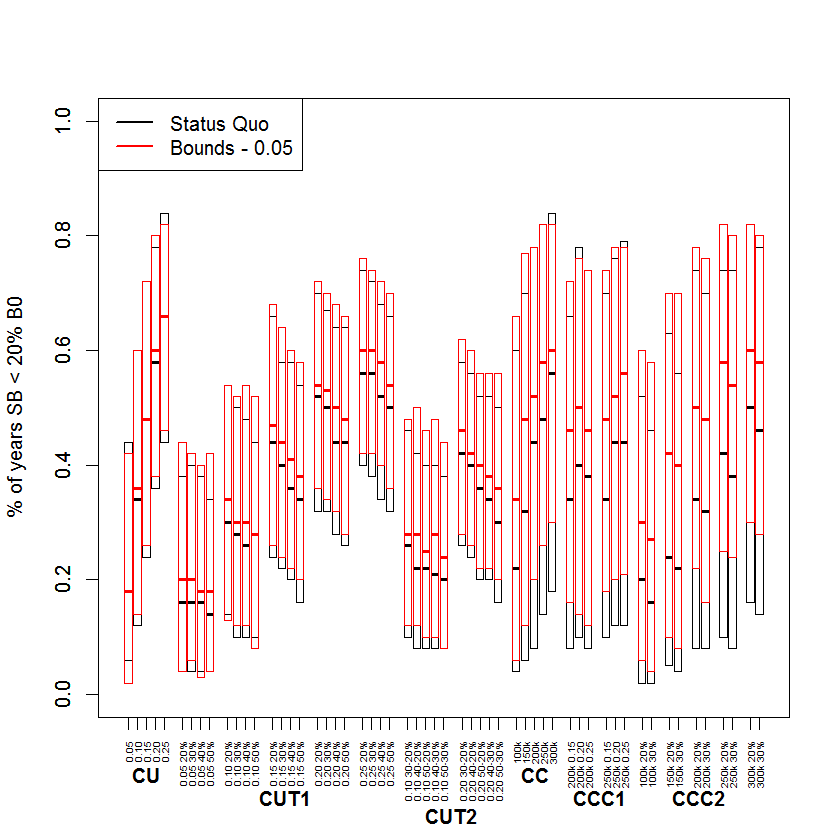
Supplemental Figure 2.11. Summary of the distributions of absolute annual variation in yield for the simulation period (50 yrs) for the 4yr recruitment scenario. Plot depicts two scenarios regarding assessment error. In red is a scenario where . In black is the “status quo” scenario where . Shown are medians (horizontal bars) and 25-75 quantiles (boxes).



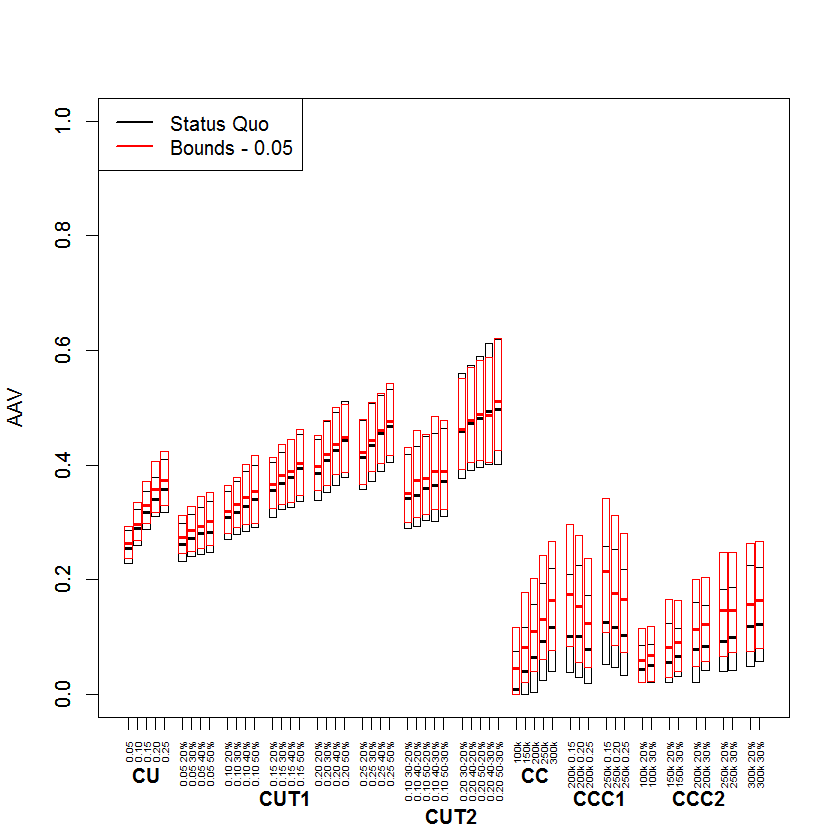
Supplemental Figure 2.12. Summary of the distributions of spawning biomass at the end of the simulation period (50 yrs) for the 4yr recruitment scenario. Plot depicts two scenarios regarding assessment error. In red is a scenario where . In black is the “status quo” scenario where . Shown are medians (horizontal bars) and 25-75 quantiles (boxes).



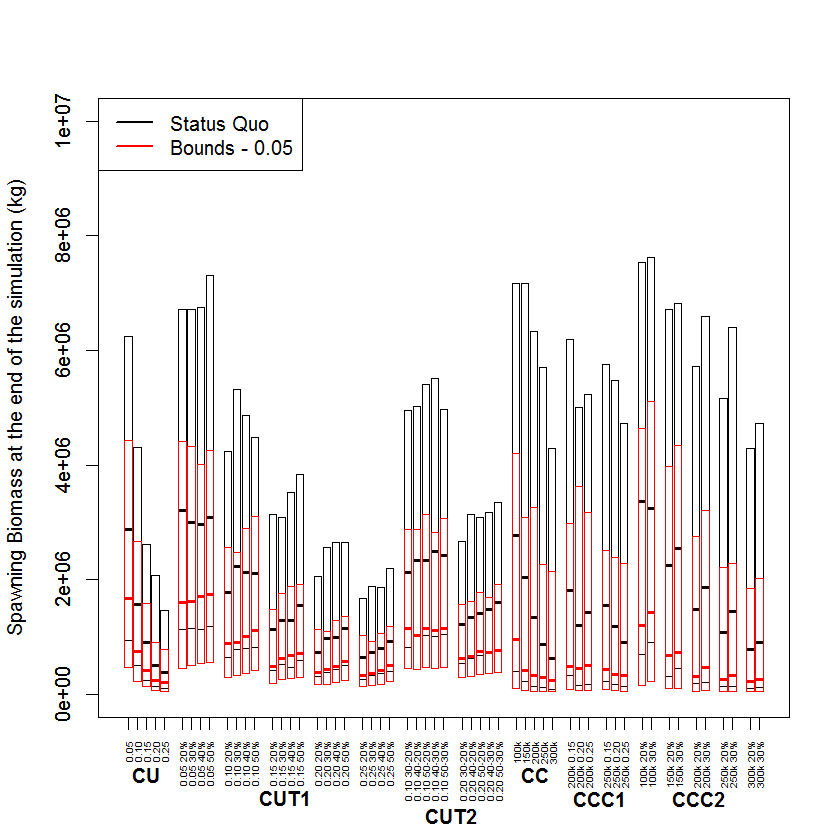
Supplemental Figure 2.13. Summary of the distributions of average harvest per year for the simulation period (50 yrs) for the 4yr recruitment scenario. Plot depicts two scenarios. In black is the status quo scenario, where bounds of the uniform distribution defining the probability of a boom year class are as specified in the text. In red is a scenario where the bounds of the uniform distribution defining the probability of a boom year class are shifted **down** by 0.05. Shown are medians (horizontal bars) and 25-75 quantiles (boxes).



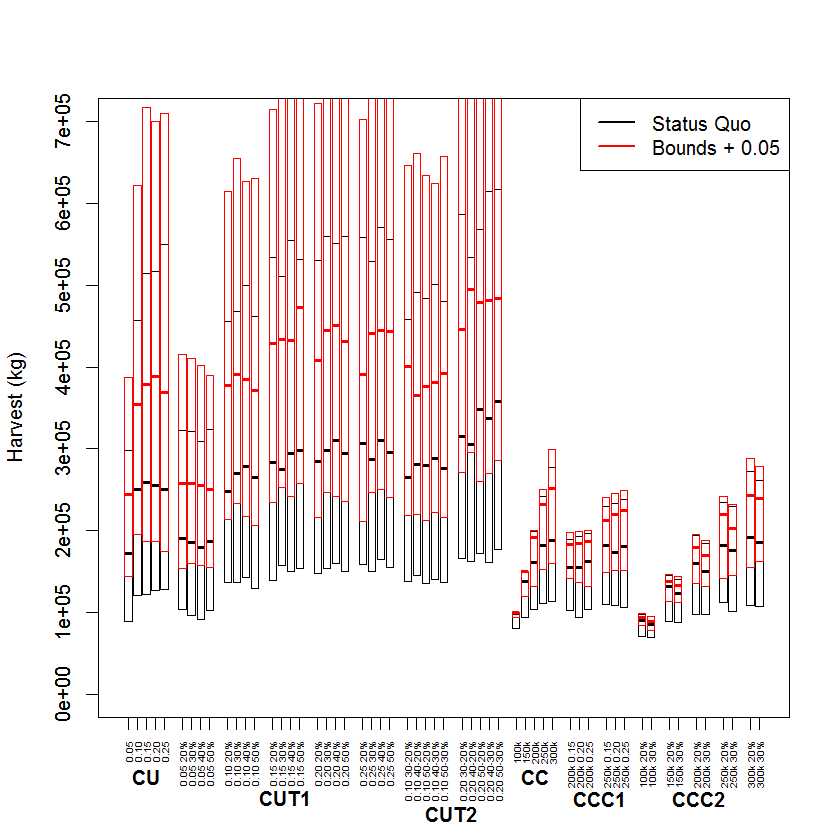
Supplemental Figure 2.14. Summary of the distributions of risk, or percentage of years in each simulation period (50 yrs) where SB is below 20% of the unfished size for the 4yr recruitment scenario. Plot depicts two scenarios. In black is the status quo scenario, where bounds of the uniform distribution defining the probability of a boom year class are as specified in the text. In red is a scenario where the bounds of the uniform distribution defining the probability of a boom year class are shifted **down** by 0.05. Shown are medians (horizontal bars) and 25-75 quantiles (boxes).



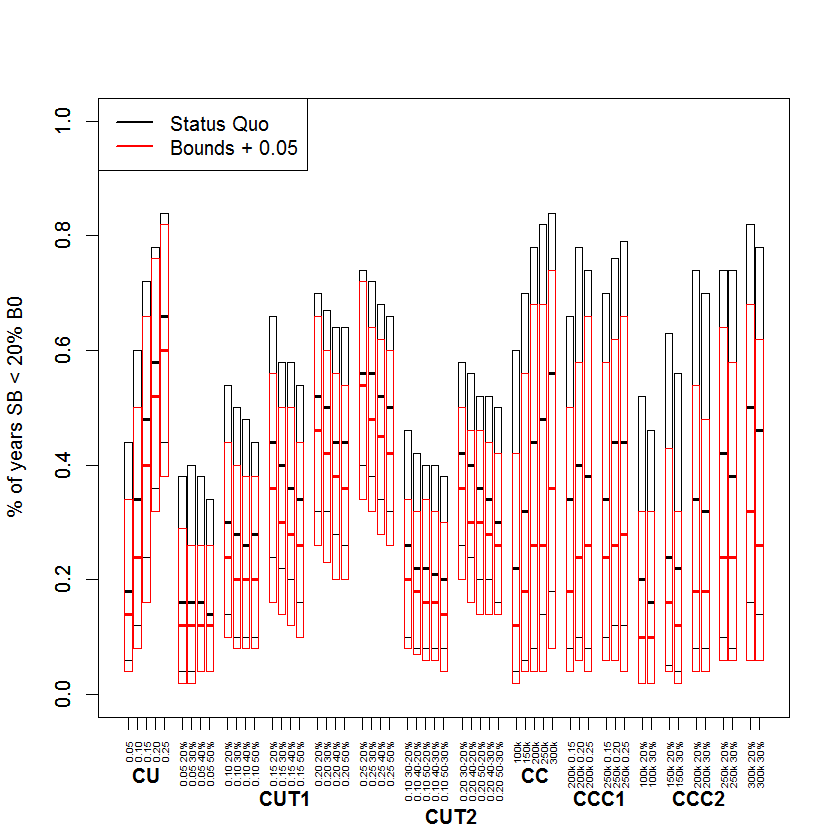
Supplemental Figure 2.15. Summary of the distributions of absolute annual variation in yield for the simulation period (50 yrs) for the 4yr recruitment scenario. Plot depicts two scenarios. In black is the status quo scenario, where bounds of the uniform distribution defining the probability of a boom year class are as specified in the text. In red is a scenario where the bounds of the uniform distribution defining the probability of a boom year class are shifted **down** by 0.05. Shown are medians (horizontal bars) and 25-75 quantiles (boxes).



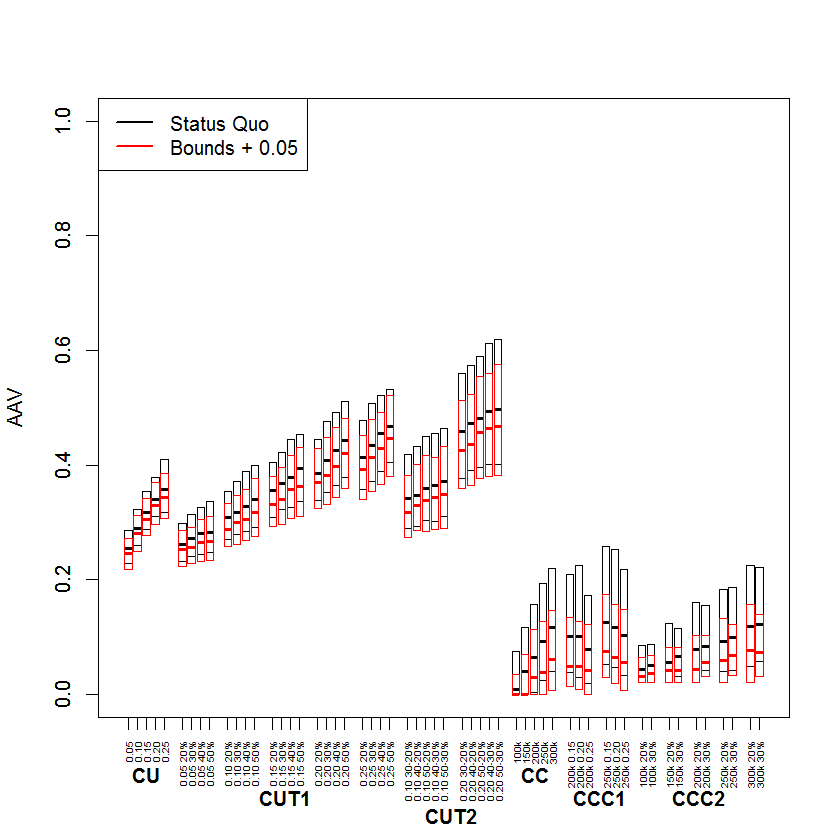
Supplemental Figure 2.16. Summary of the distributions of spawning biomass at the end of the simulation period (50 yrs) for the 4yr recruitment scenario. Plot depicts two scenarios. In black is the status quo scenario, where bounds of the uniform distribution defining the probability of a boom year class are as specified in the text. In red is a scenario where the bounds of the uniform distribution defining the probability of a boom year class are shifted **down** by 0.05. Shown are medians (horizontal bars) and 25-75 quantiles (boxes).



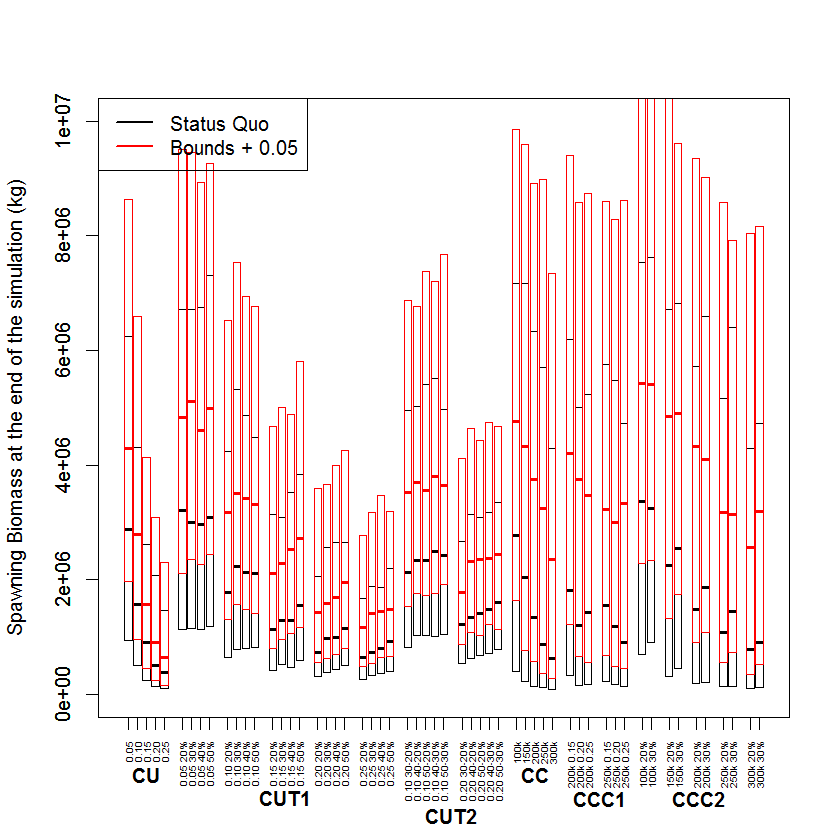
Supplemental Figure 2.17. Summary of the distributions of average harvest per year for the simulation period (50 yrs) for the 4yr recruitment scenario. Plot depicts two scenarios. In black is the status quo scenario, where bounds of the uniform distribution defining the probability of a boom year class are as specified in the text. In red is a scenario where the bounds of the uniform distribution defining the probability of a boom year class are shifted **up** by 0.05. Shown are medians (horizontal bars) and 25-75 quantiles (boxes).



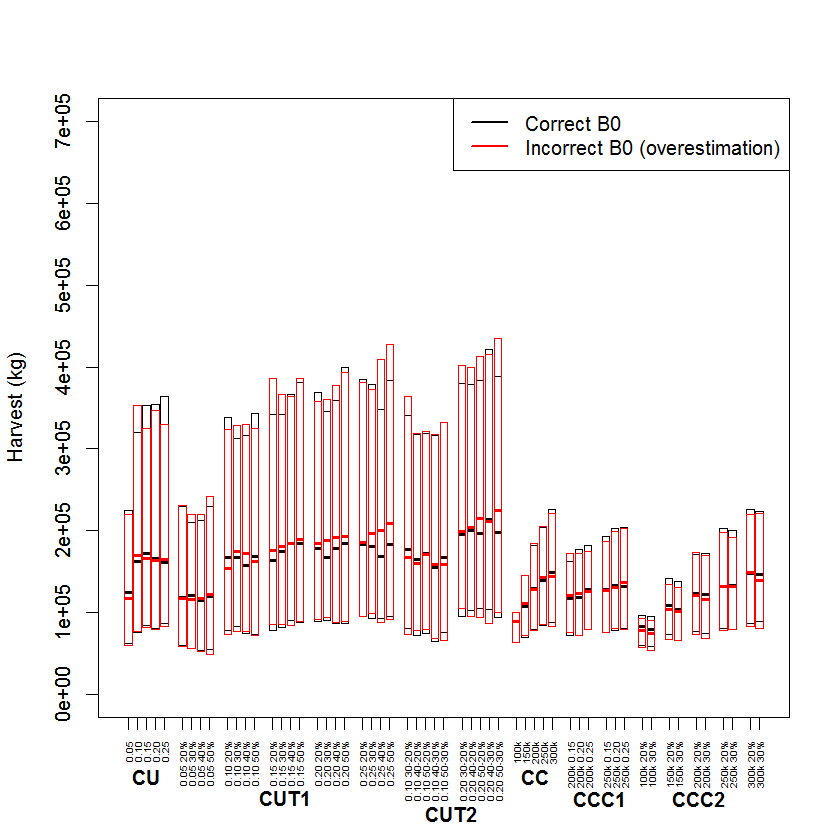
Supplemental Figure 2.18. Summary of the distributions of risk, the percentage of years in a simulation with SB < 20% of the unfished level for the 4yr recruitment scenario. Plot depicts two scenarios. In black is the status quo scenario, where bounds of the uniform distribution defining the probability of a boom year class are as specified in the text. In red is a scenario where the bounds of the uniform distribution defining the probability of a boom year class are shifted **up** by 0.05. Shown are medians (horizontal bars) and 25-75 quantiles (boxes).

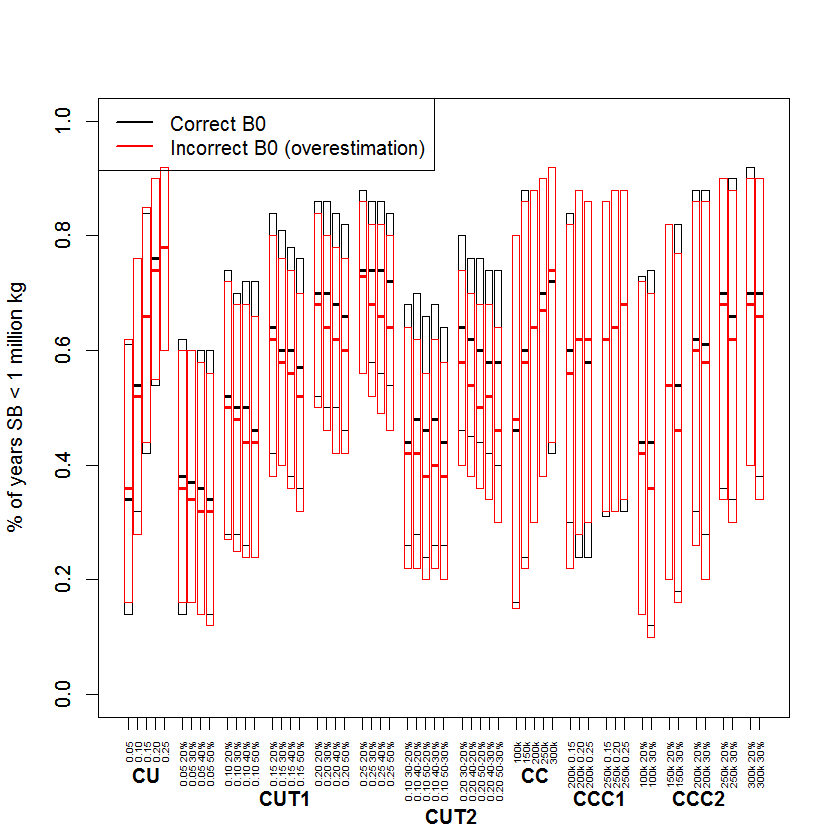


Supplemental Figure 2.19. Summary of the distributions of absolute annual variation in yield for the simulation period (50 yrs) for the 4yr recruitment scenario. Plot depicts two scenarios. In black is the status quo scenario, where bounds of the uniform distribution defining the probability of a boom year class are as specified in the text. In red is a scenario where the bounds of the uniform distribution defining the probability of a boom year class are shifted **up** by 0.05. Shown are medians (horizontal bars) and 25-75 quantiles (boxes).

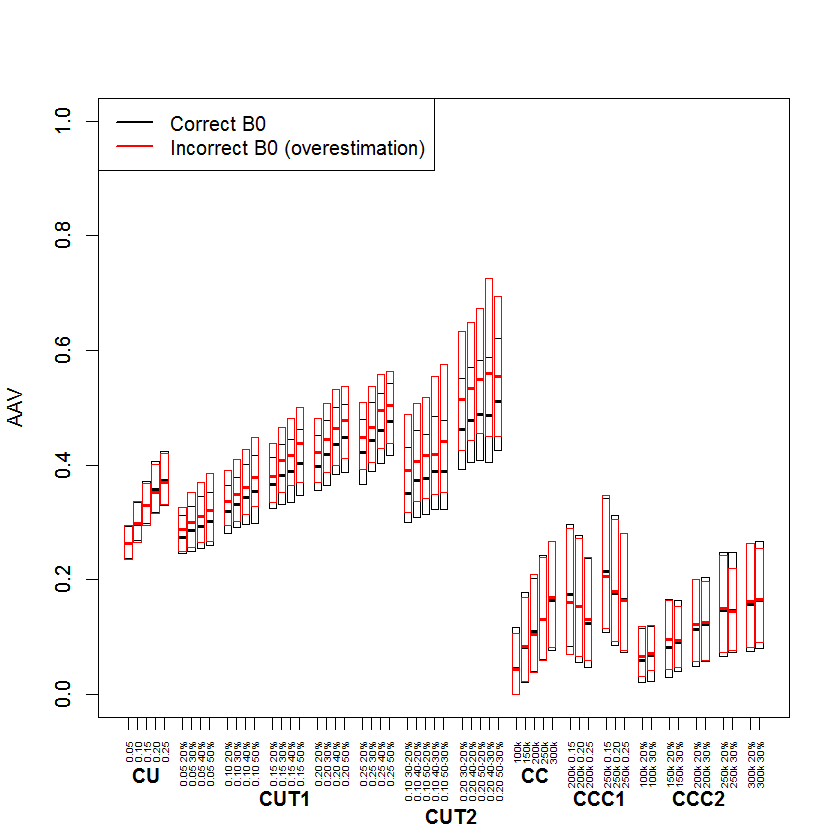


Supplemental Figure 2.20. Summary of the distributions of spawning biomass at the end of the simulation period (50 yrs) for the 4yr recruitment scenario. Plot depicts two scenarios. In black is the status quo scenario, where bounds of the uniform distribution defining the probability of a boom year class are as specified in the text. In red is a scenario where the bounds of the uniform distribution defining the probability of a boom year class are shifted **up** by 0.05. Shown are medians (horizontal bars) and 25-75 quantiles (boxes).

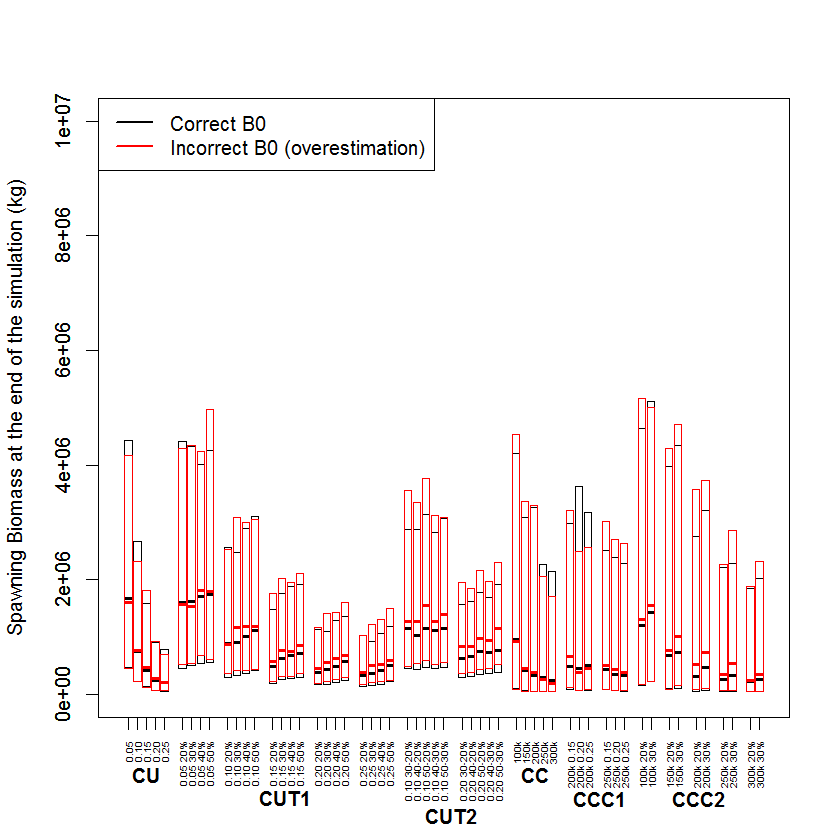
 Supplemental Figure 2.21. Summary of the distributions of average harvest per year for the simulation period (50 yrs) for the 4yr recruitment scenario. Plot depicts two scenarios where the bounds of the uniform distribution defining the probability of a boom year class are shifted **down** by 0.05. In red is a scenario where unfished spawning biomass is incorrectly assumed according to the status quo scenario (original uniform bounds). In black is a scenario where the unfished biomass is calculated (“correctly”) according to the shift in productivity (shift in bounds of the uniform). Shown are medians (horizontal bars) and 25-75 quantiles (boxes).



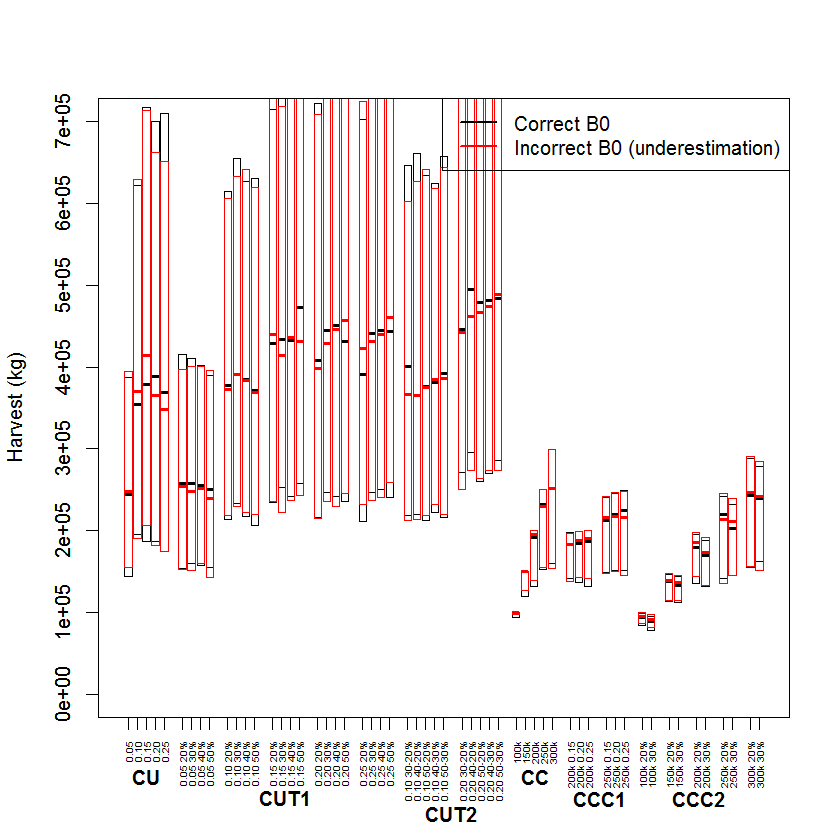
Supplemental Figure 2.22. Summary of the distributions of the percent of years spawning biomass is below 1 million kg (risk) for the simulation period (50 yrs) for the 4yr recruitment scenario. Plot depicts two scenarios where the bounds of the uniform distribution defining the probability of a boom year class are shifted **down** by 0.05. In red is a scenario where unfished spawning biomass is incorrectly assumed according to the status quo scenario (original uniform bounds). In black is a scenario where the unfished biomass is calculated (“correctly”) according to the shift in productivity (shift in bounds of the uniform). Shown are medians (horizontal bars) and 25-75 quantiles (boxes).



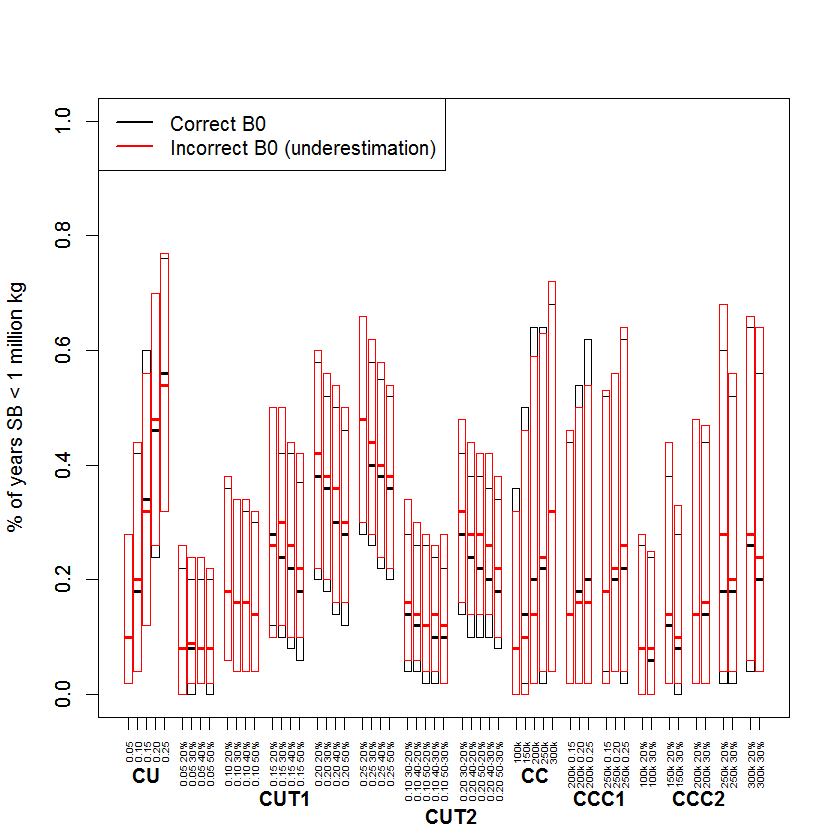
Supplemental Figure 2.23. Summary of the distributions of absolute annual variation in yield for the simulation period (50 yrs) for the 4yr recruitment scenario. Plot depicts two scenarios where the bounds of the uniform distribution defining the probability of a boom year class are shifted **down** by 0.05. In red is a scenario where unfished spawning biomass is incorrectly assumed according to the status quo scenario (original uniform bounds). In black is a scenario where the unfished biomass is calculated (“correctly”) according to the shift in productivity (shift in bounds of the uniform). Shown are medians (horizontal bars) and 25-75 quantiles (boxes).



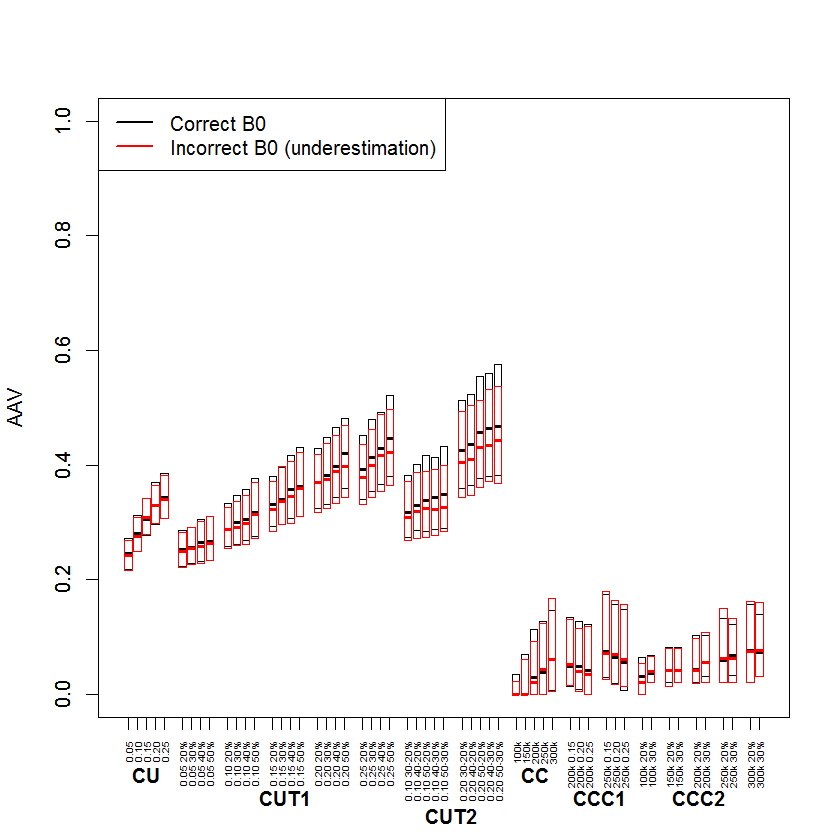
Supplemental Figure 2.24. Summary of the distributions of spawning biomass at the end of the simulation period (50 yrs) for the 4yr recruitment scenario. Plot depicts two scenarios where the bounds of the uniform distribution defining the probability of a boom year class are shifted **down** by 0.05. In red is a scenario where unfished spawning biomass is incorrectly assumed according to the status quo scenario (original uniform bounds). In black is a scenario where the unfished biomass is calculated (“correctly”) according to the shift in productivity (shift in bounds of the uniform). Shown are medians (horizontal bars) and 25-75 quantiles (boxes).



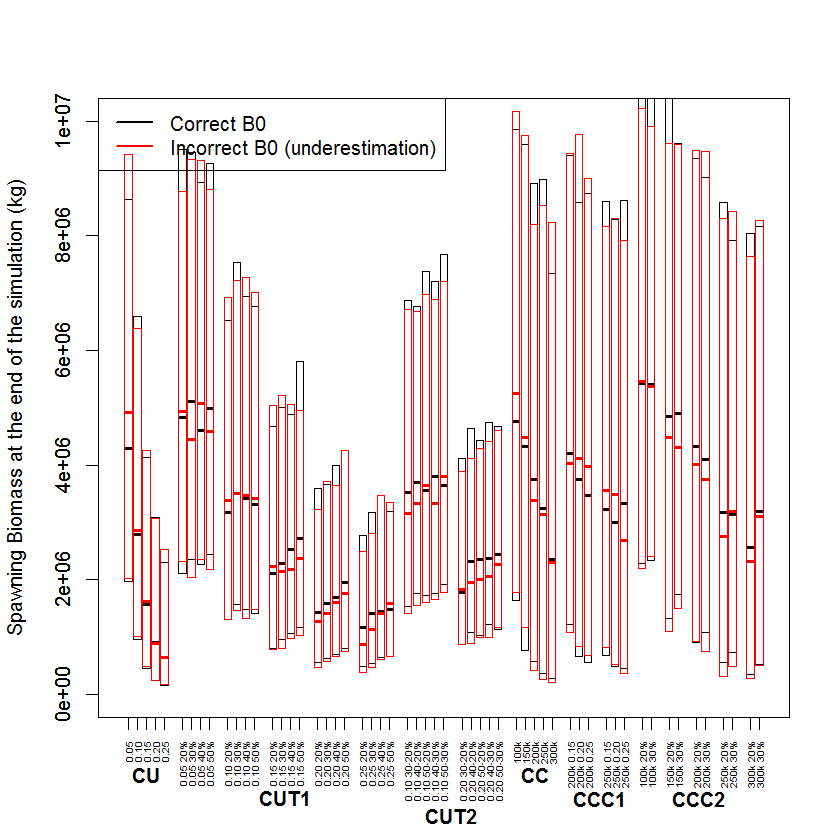
Supplemental Figure 2.25. Summary of the distributions of average harvest per year for the simulation period (50 yrs) for the 4yr recruitment scenario. Plot depicts two scenarios where the bounds of the uniform distribution defining the probability of a boom year class are shifted **up** by 0.05. In red is a scenario where unfished spawning biomass is incorrectly assumed according to the status quo scenario (original uniform bounds). In black is a scenario where the unfished biomass is calculated (“correctly”) according to the shift in productivity (shift in bounds of the uniform). Shown are medians (horizontal bars) and 25-75 quantiles (boxes).



Supplemental Figure 2.26. Summary of the distributions of the percent of years spawning biomass is below 1 million kg for the simulation period (50 yrs) for the 4yr recruitment scenario. Plot depicts two scenarios where the bounds of the uniform distribution defining the probability of a boom year class are shifted **up** by 0.05. In red is a scenario where unfished spawning biomass is incorrectly assumed according to the status quo scenario (original uniform bounds). In black is a scenario where the unfished biomass is calculated (“correctly”) according to the shift in productivity (shift in bounds of the uniform). Shown are medians (horizontal bars) and 25-75 quantiles (boxes).



Supplemental Figure 2.27. Summary of the distributions of absolute annual variation in yield for the simulation period (50 yrs) for the 4yr recruitment scenario. Plot depicts two scenarios where the bounds of the uniform distribution defining the probability of a boom year class are shifted **up** by 0.05. In red is a scenario where unfished spawning biomass is incorrectly assumed according to the status quo scenario (original uniform bounds). In black is a scenario where the unfished biomass is calculated (“correctly”) according to the shift in productivity (shift in bounds of the uniform). Shown are medians (horizontal bars) and 25-75 quantiles (boxes).



Supplemental Figure 2.28. Summary of the distributions of spawning biomass at the end of the simulation period (50yrs) for the 4yr recruitment scenario. Plot depicts two scenarios where the bounds of the uniform distribution defining the probability of a boom year class are shifted **up** by 0.05. In red is a scenario where unfished spawning biomass is incorrectly assumed according to the status quo scenario (original uniform bounds). In black is a scenario where the unfished biomass is calculated (“correctly”) according to the shift in productivity (shift in bounds of the uniform). Shown are medians (horizontal bars) and 25-75 quantiles (boxes).