Monkfish Management Track Assessment

#8a

NEFMC and MAFMC

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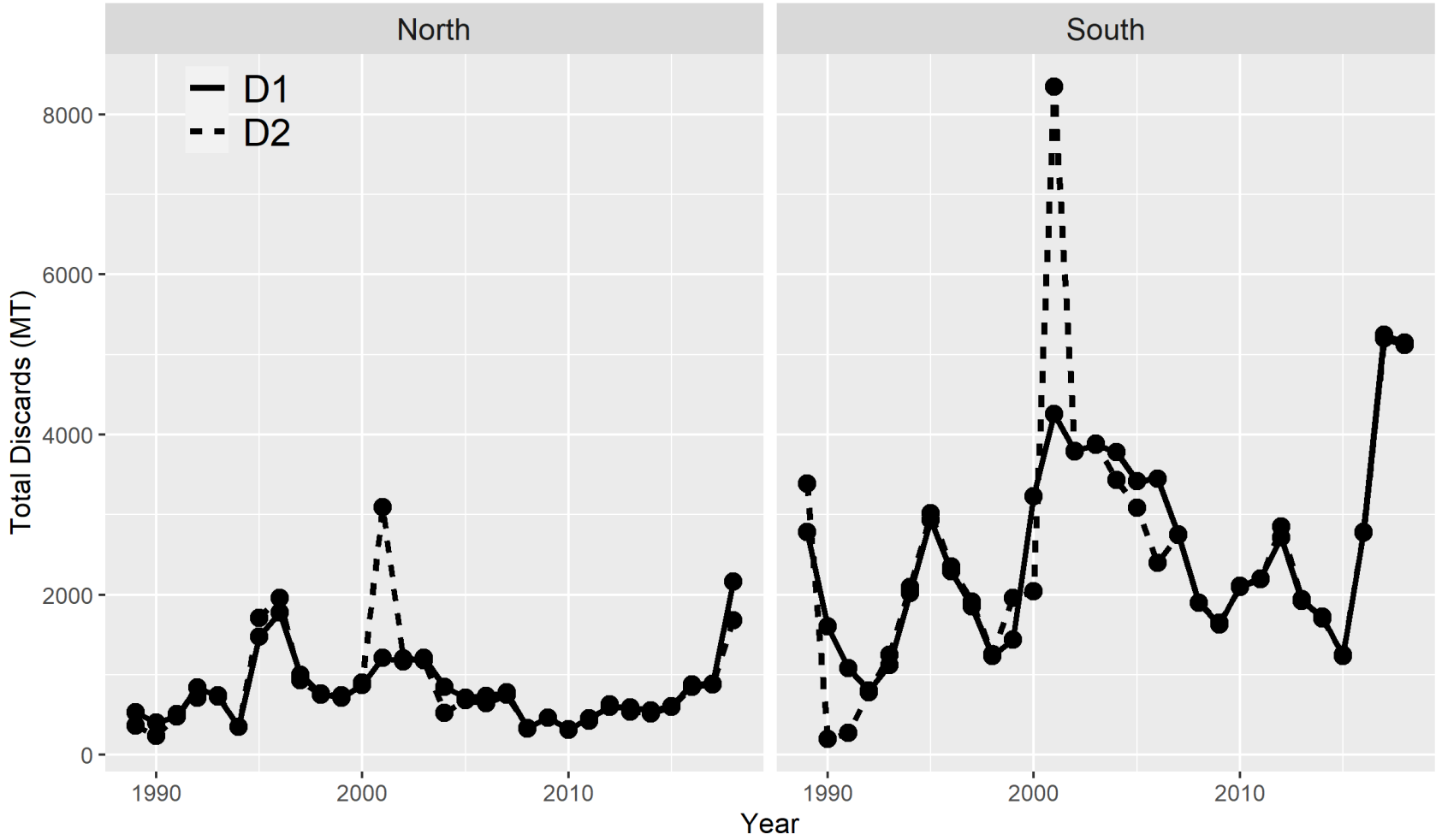
NOAA Fisheries NEFSC

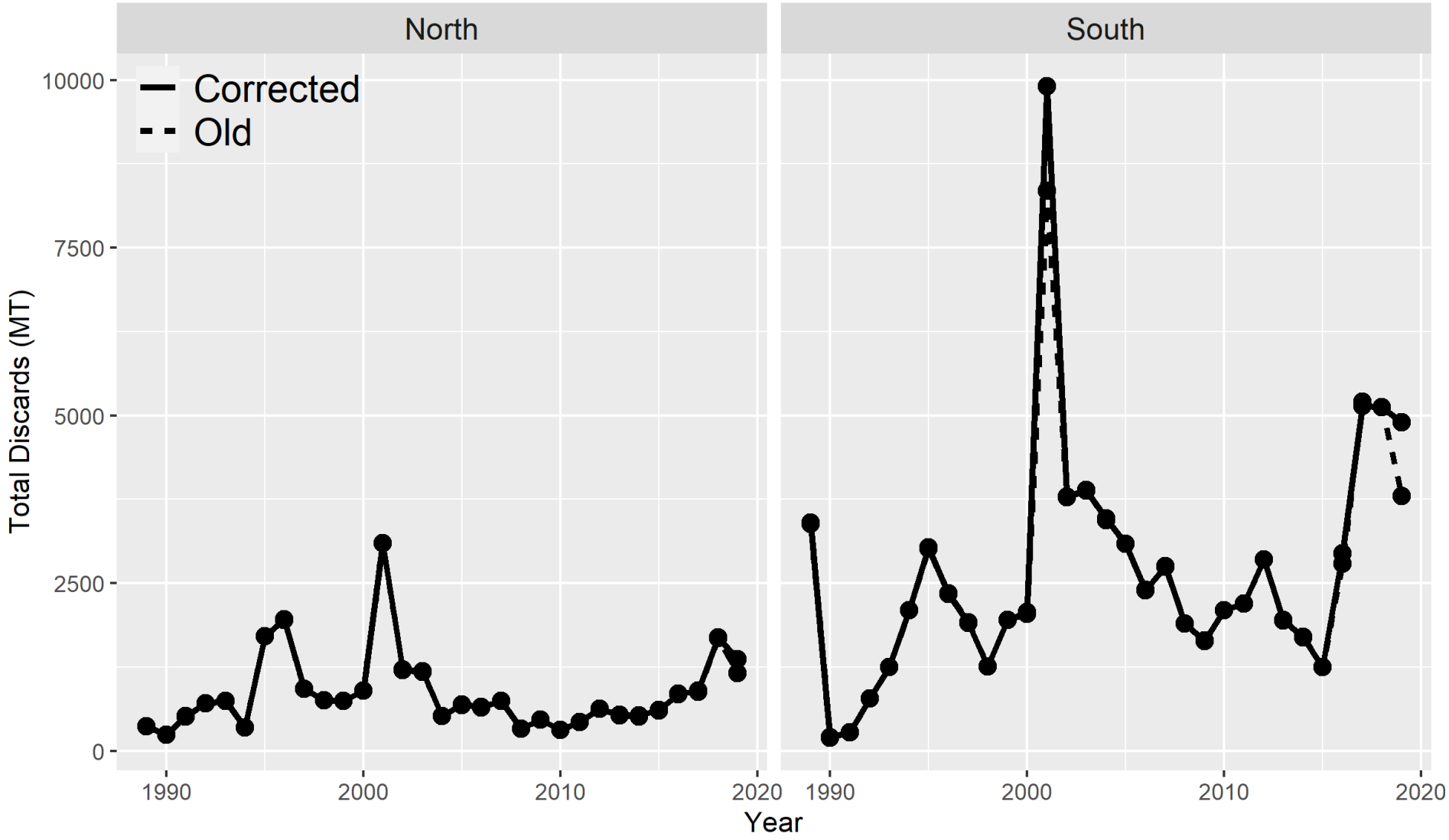
TOR 1: Estimate Catch

- Switch from D1 to D2 ratio estimator (negligible effect)
- No manual deletions (labeled D2)



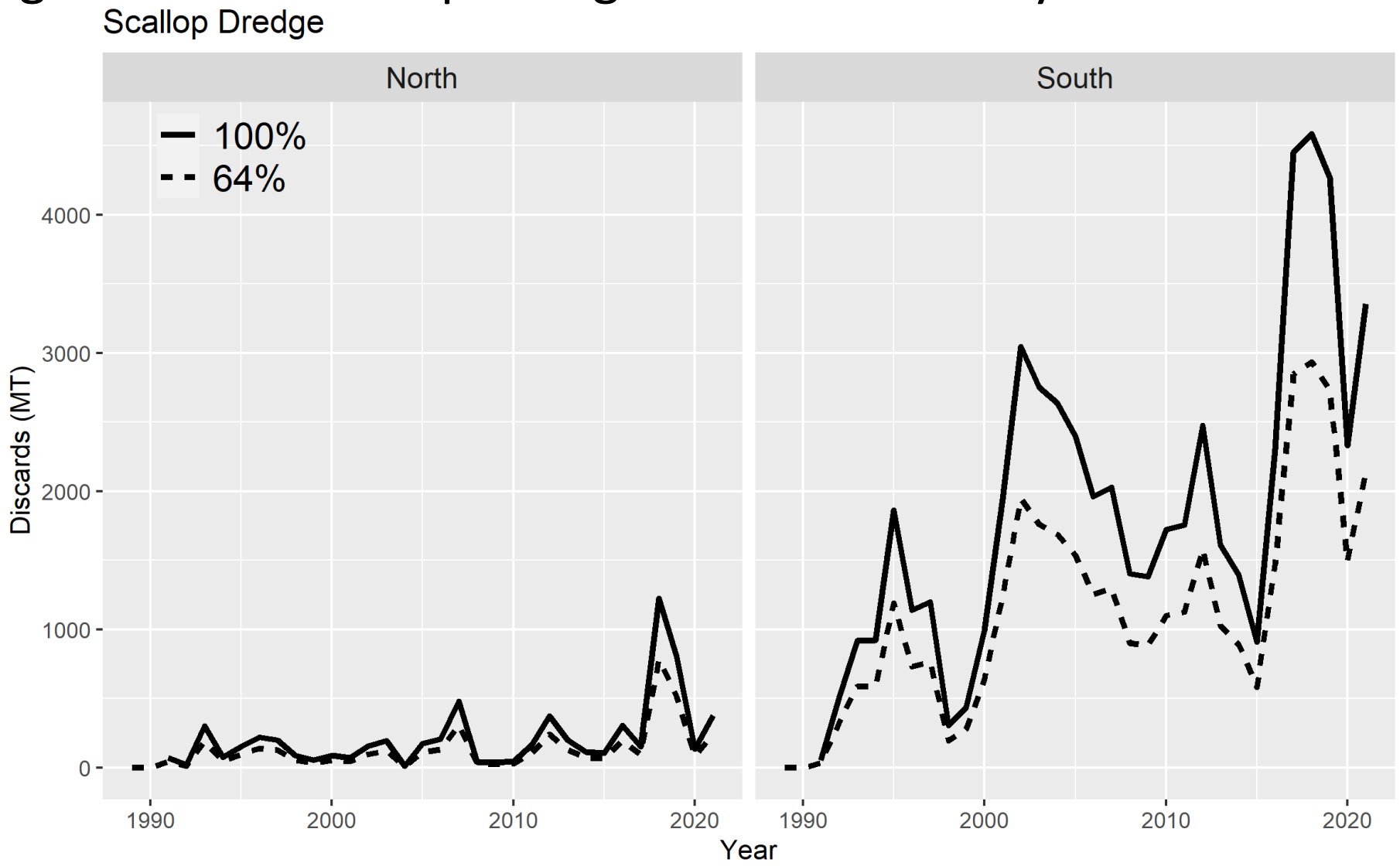
TOR 1: Estimate Catch

- Correct areas used to define stock regions



TOR 1: Estimate Catch

- Change assumed scallop dredge discard mortality from 100% to 64%



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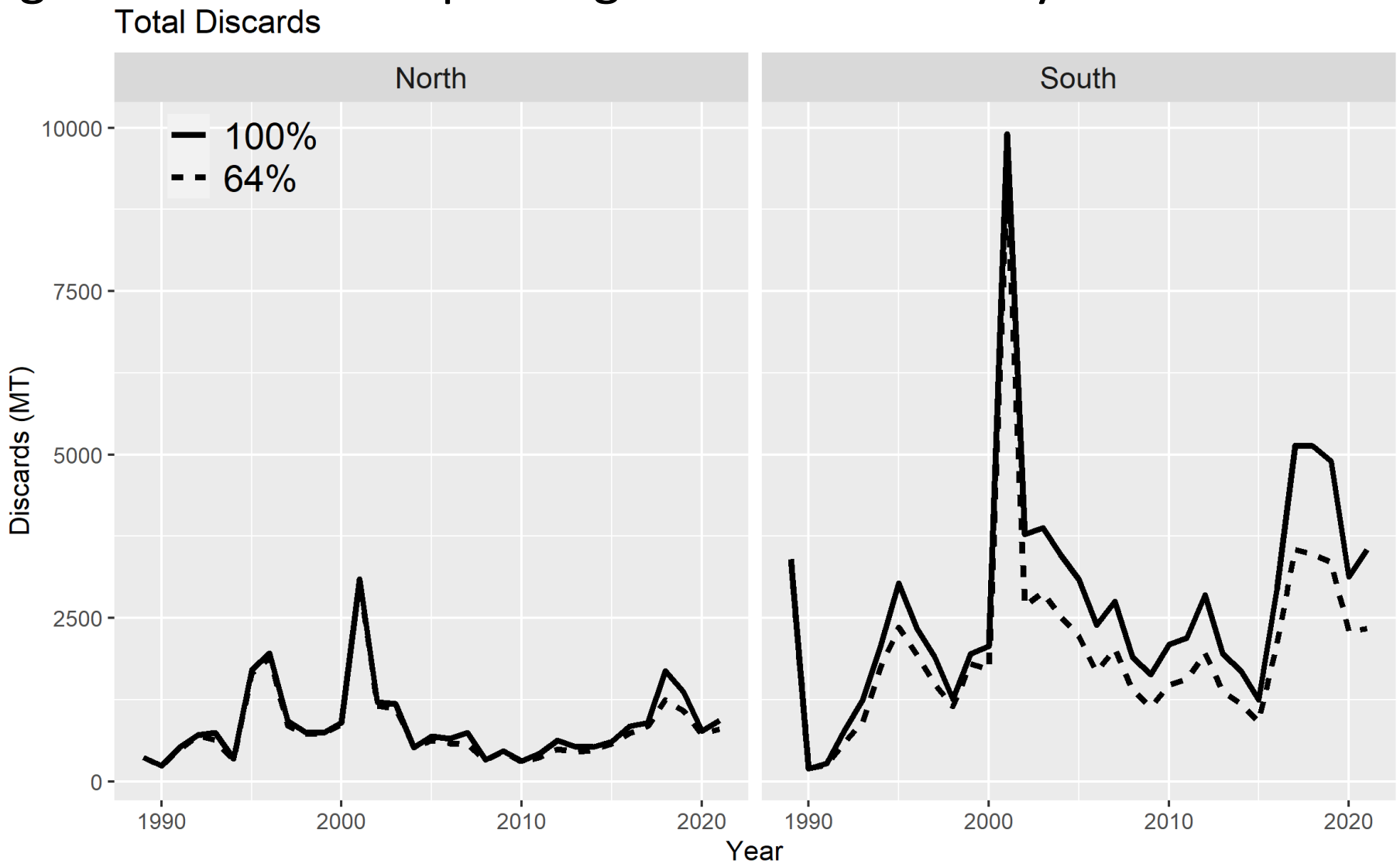

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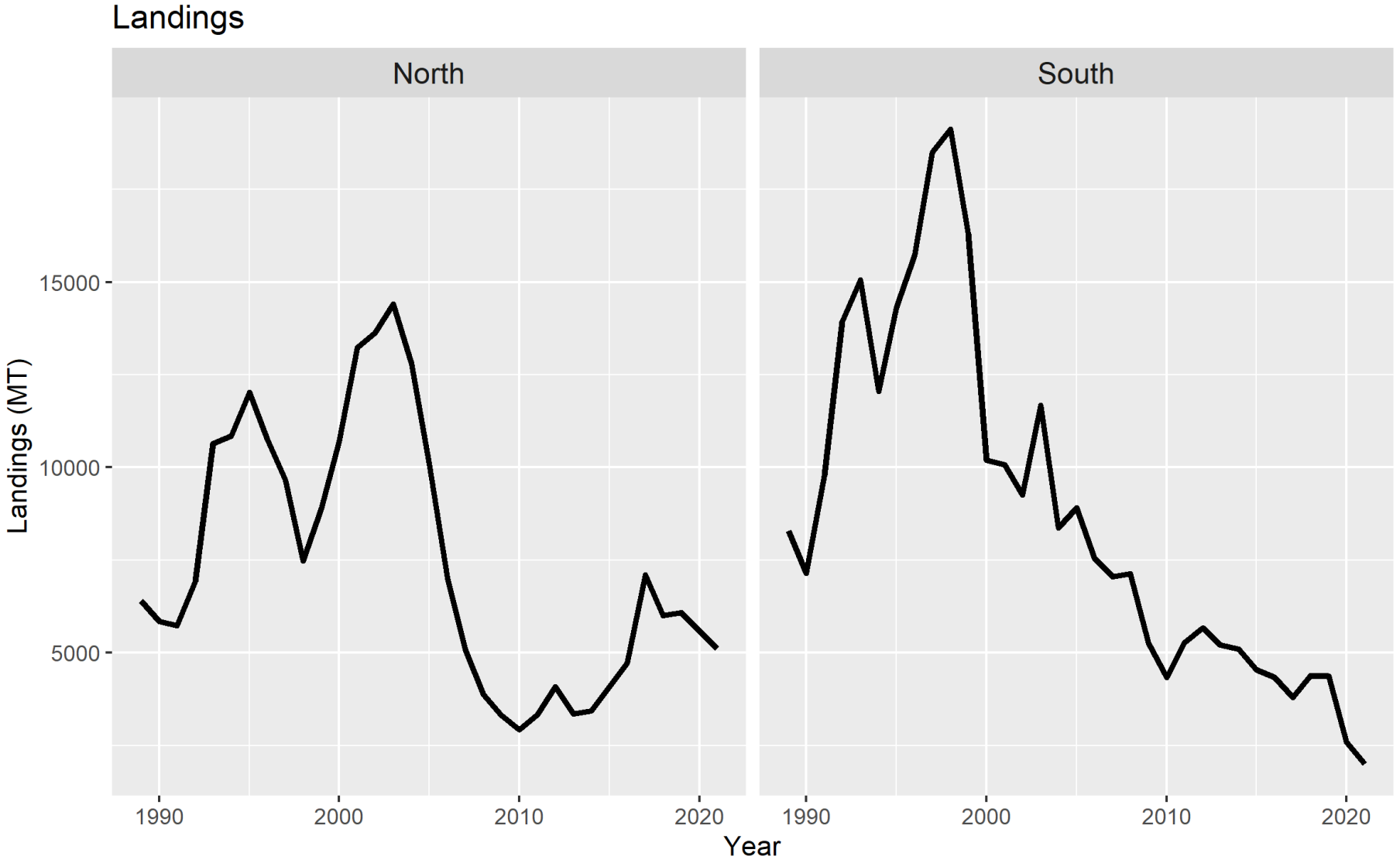

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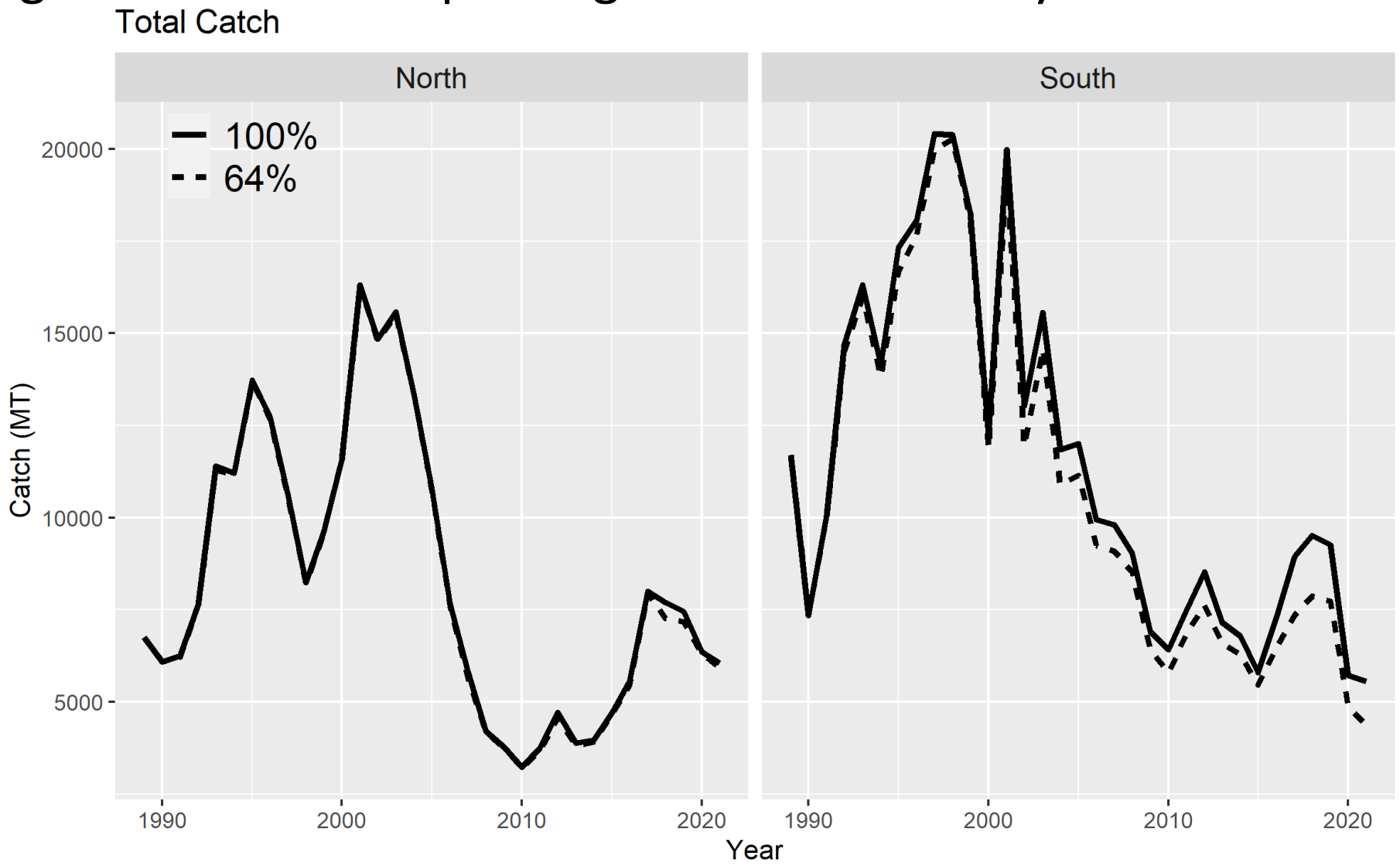
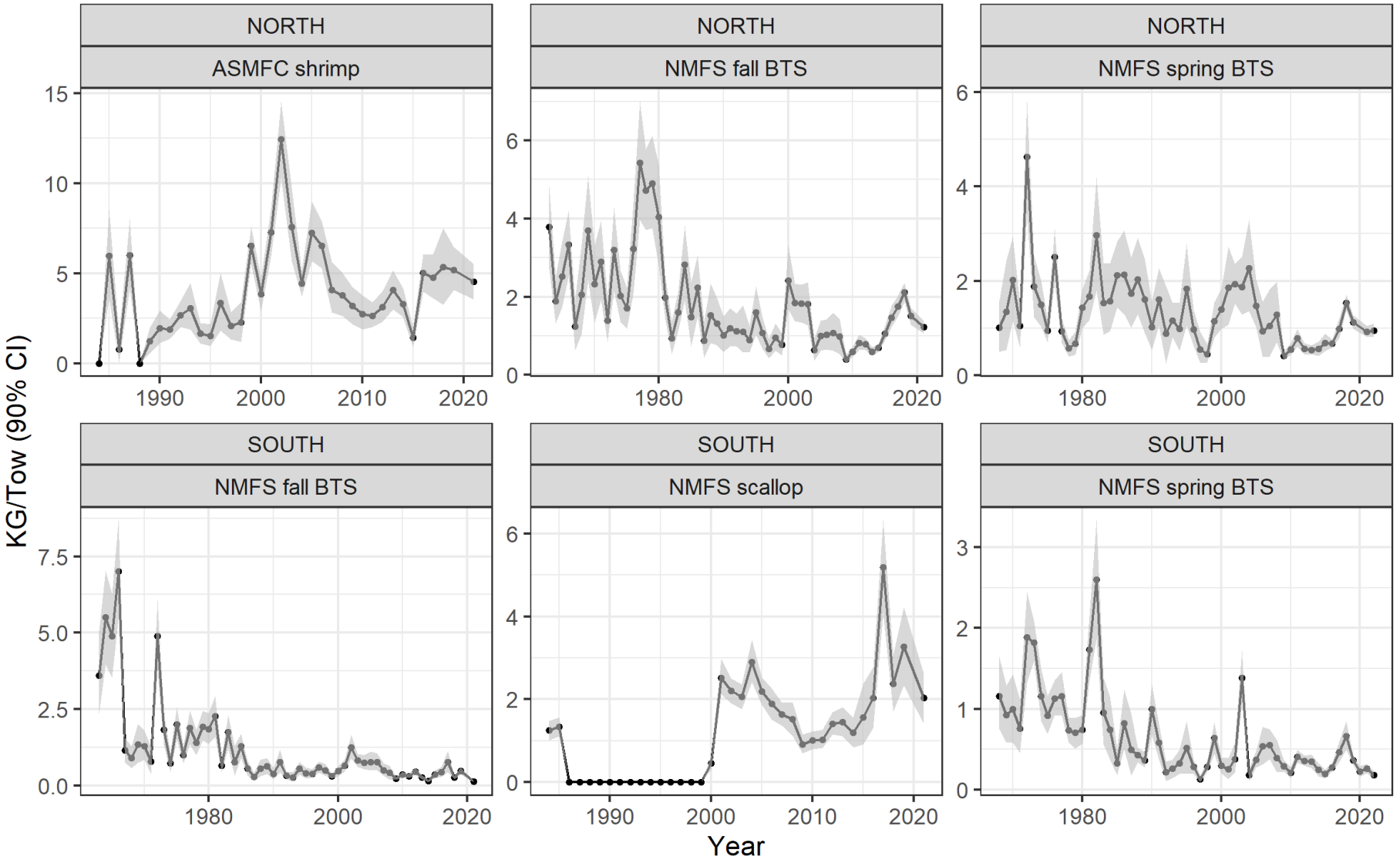


TOR 2: Evaluate Indices

- Exploitable biomass (43+cm)



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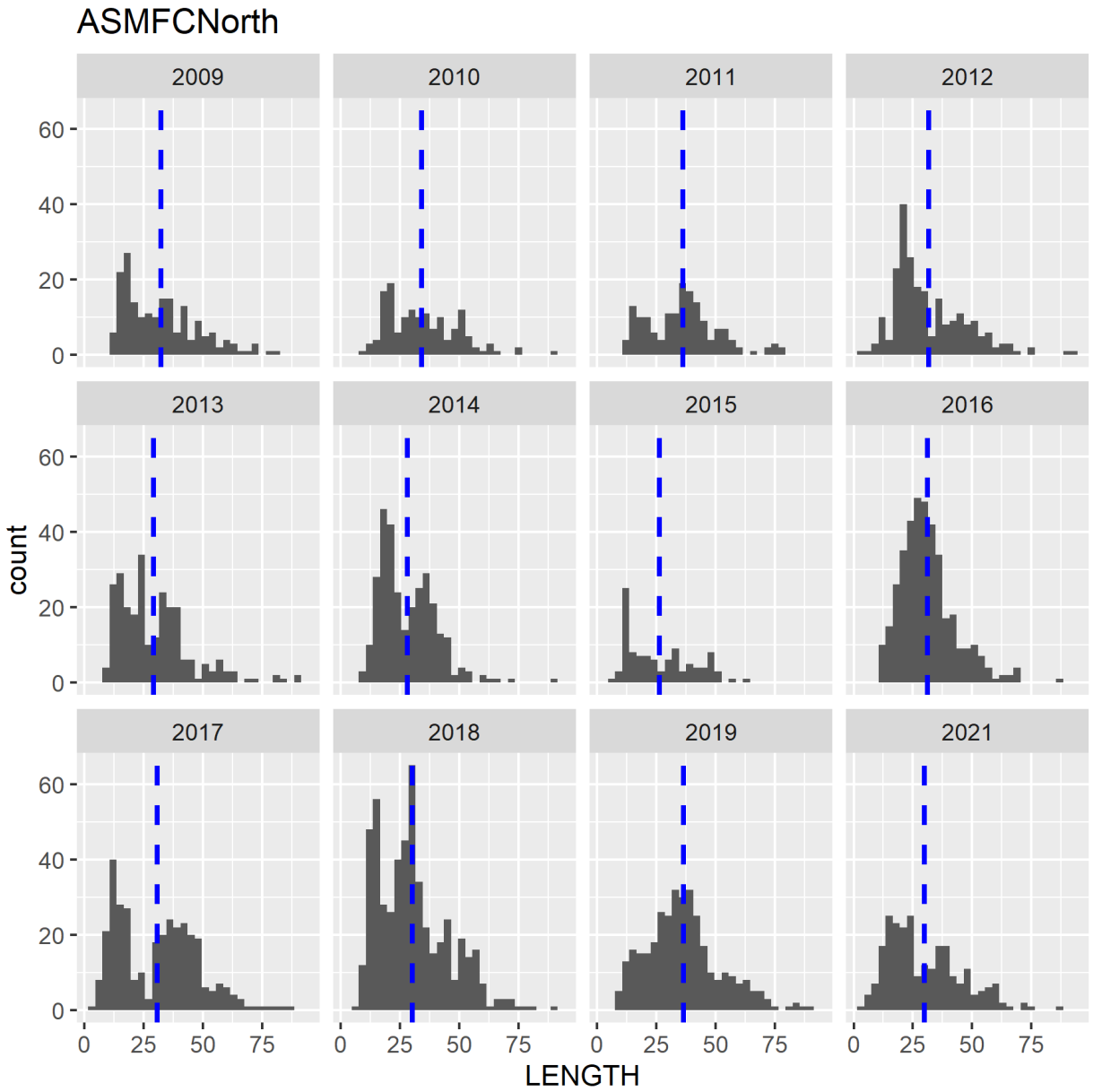

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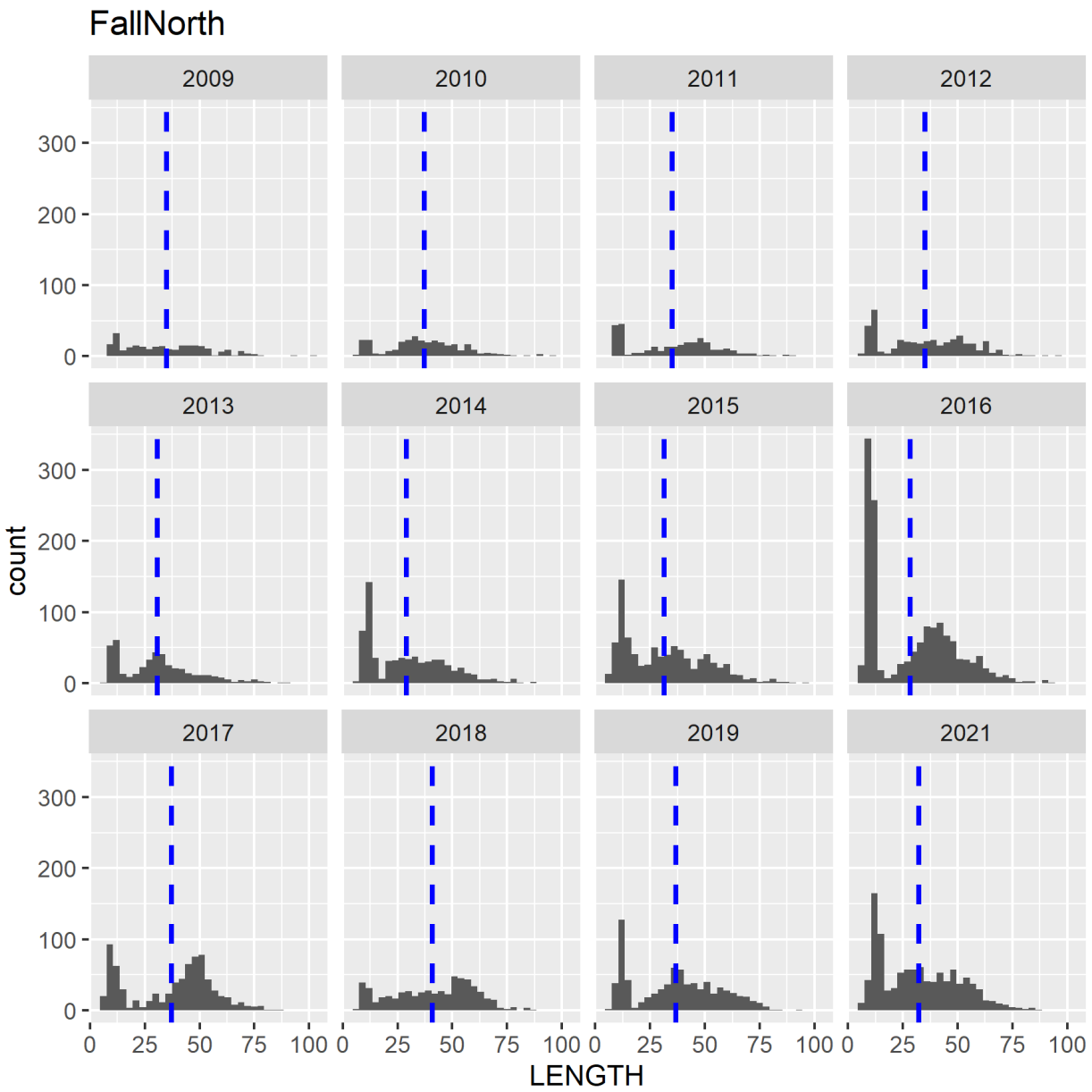

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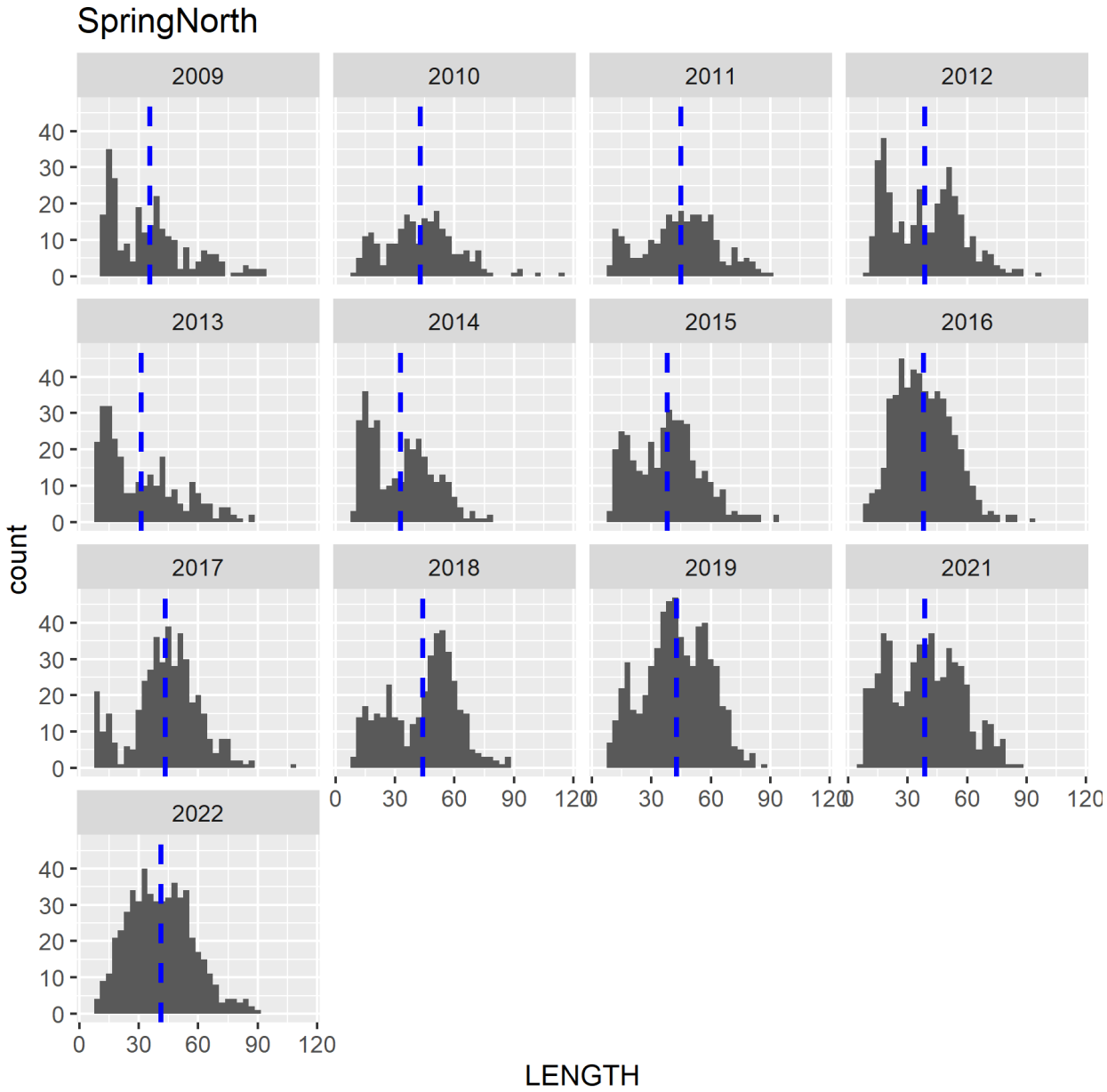

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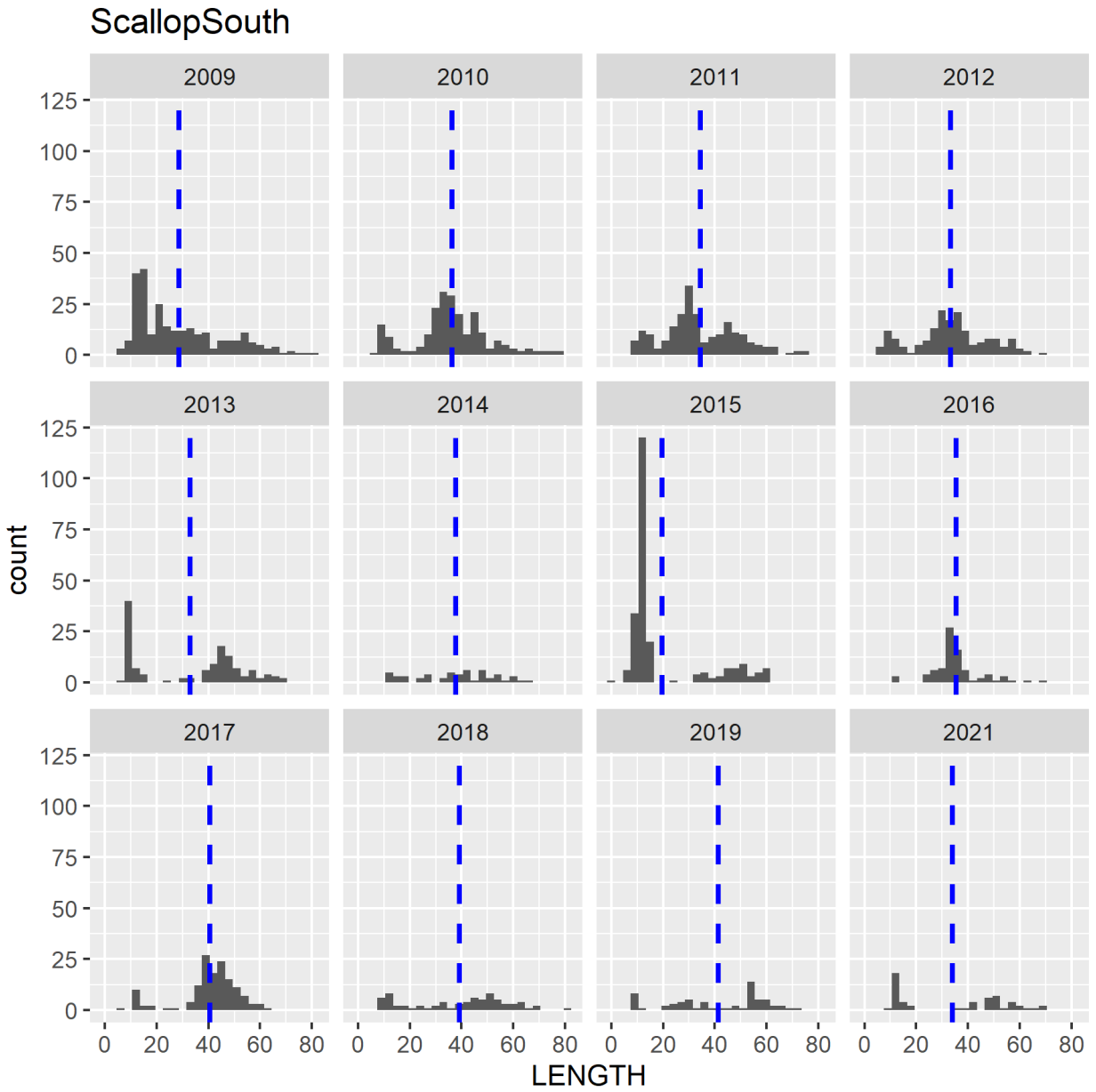

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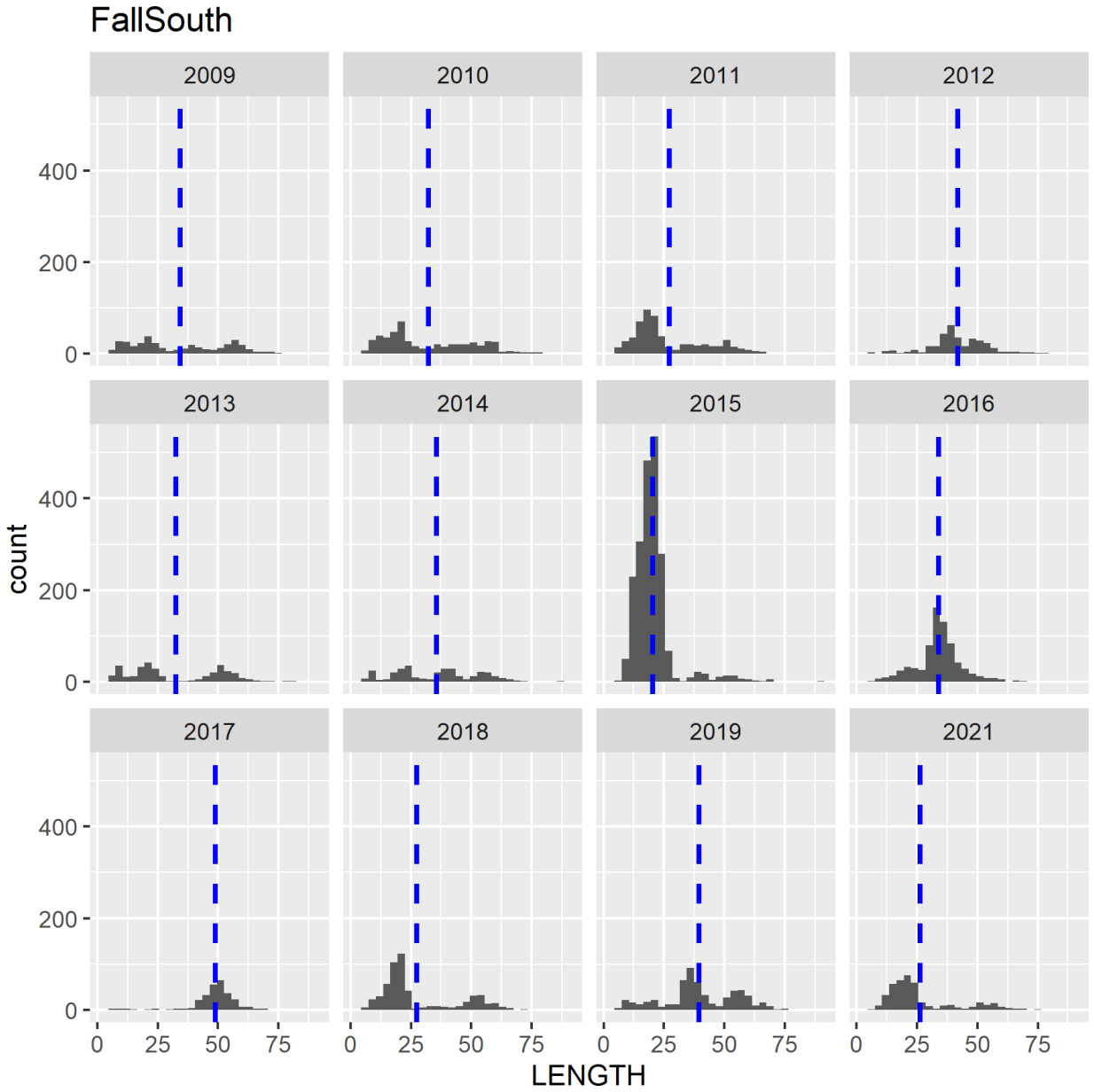

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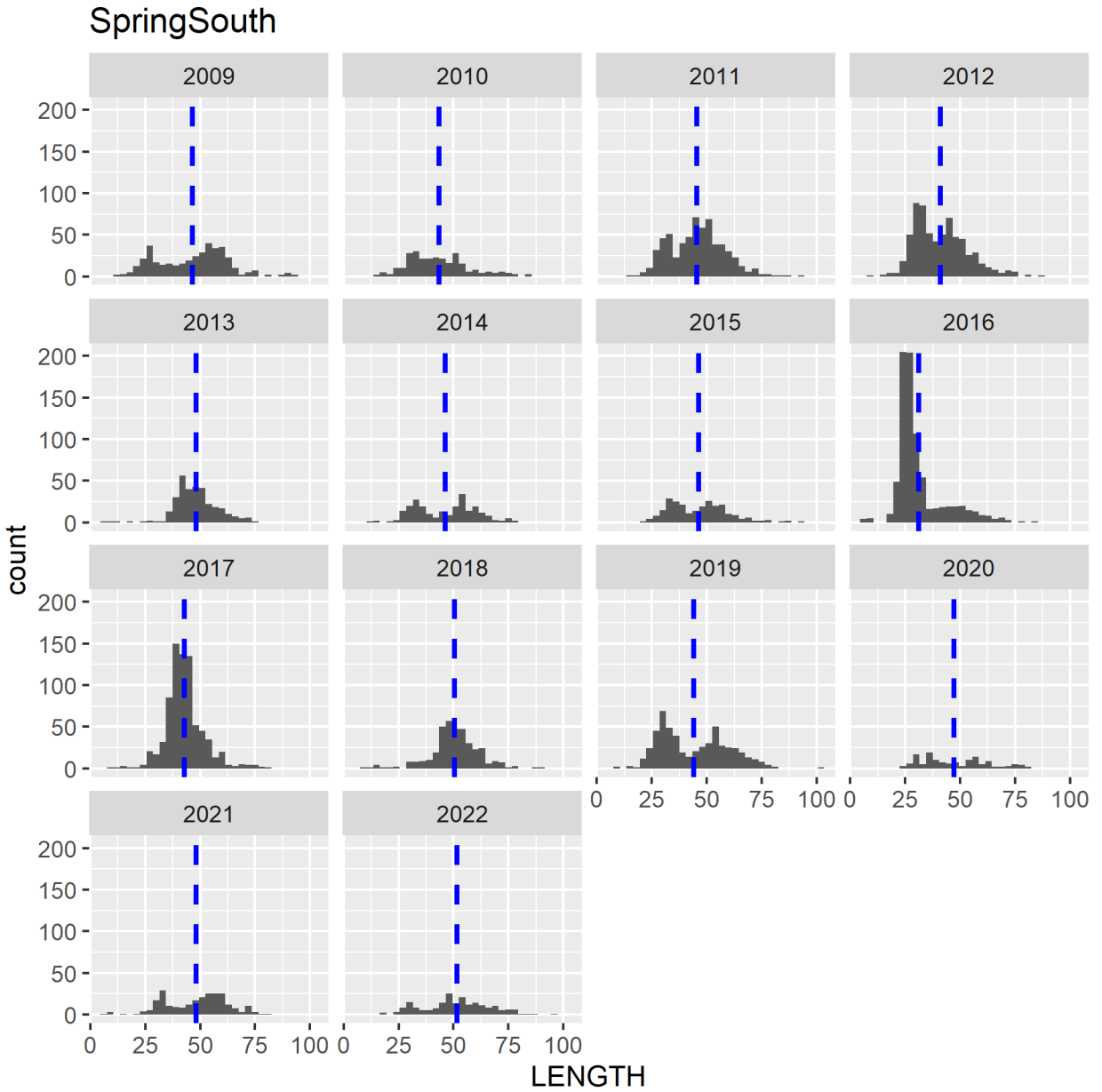
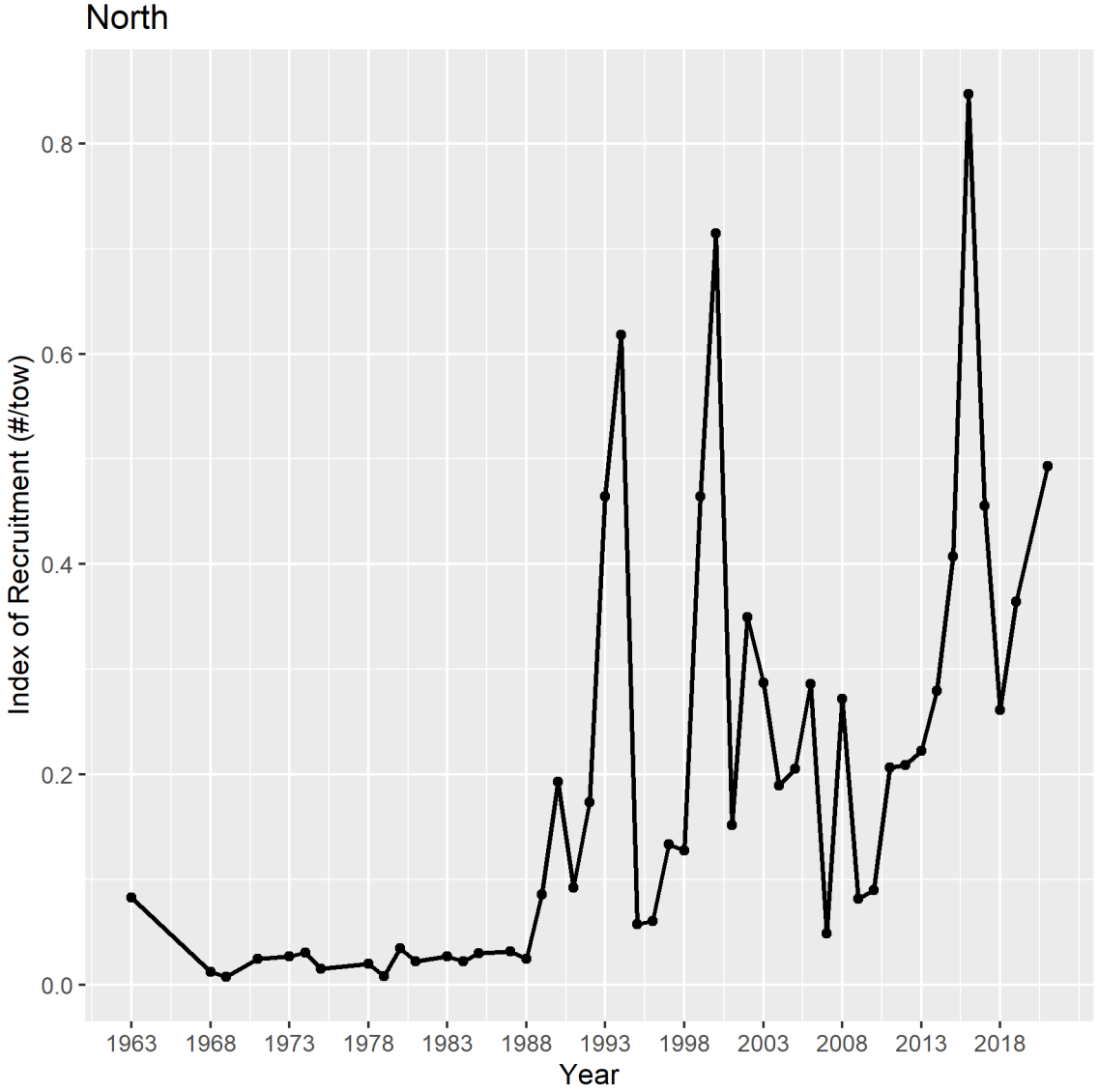
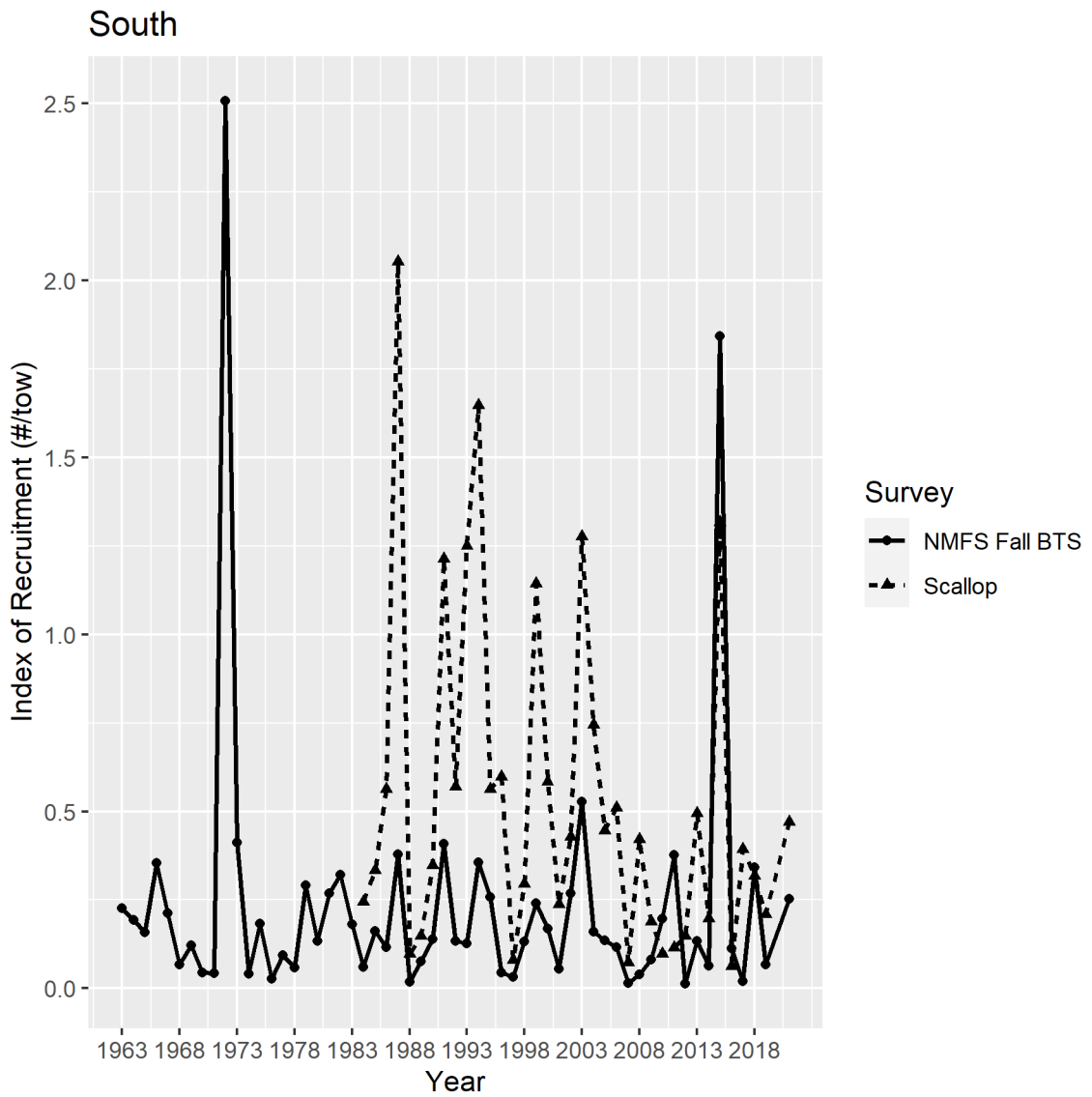


TOR 2: Evaluate Indices

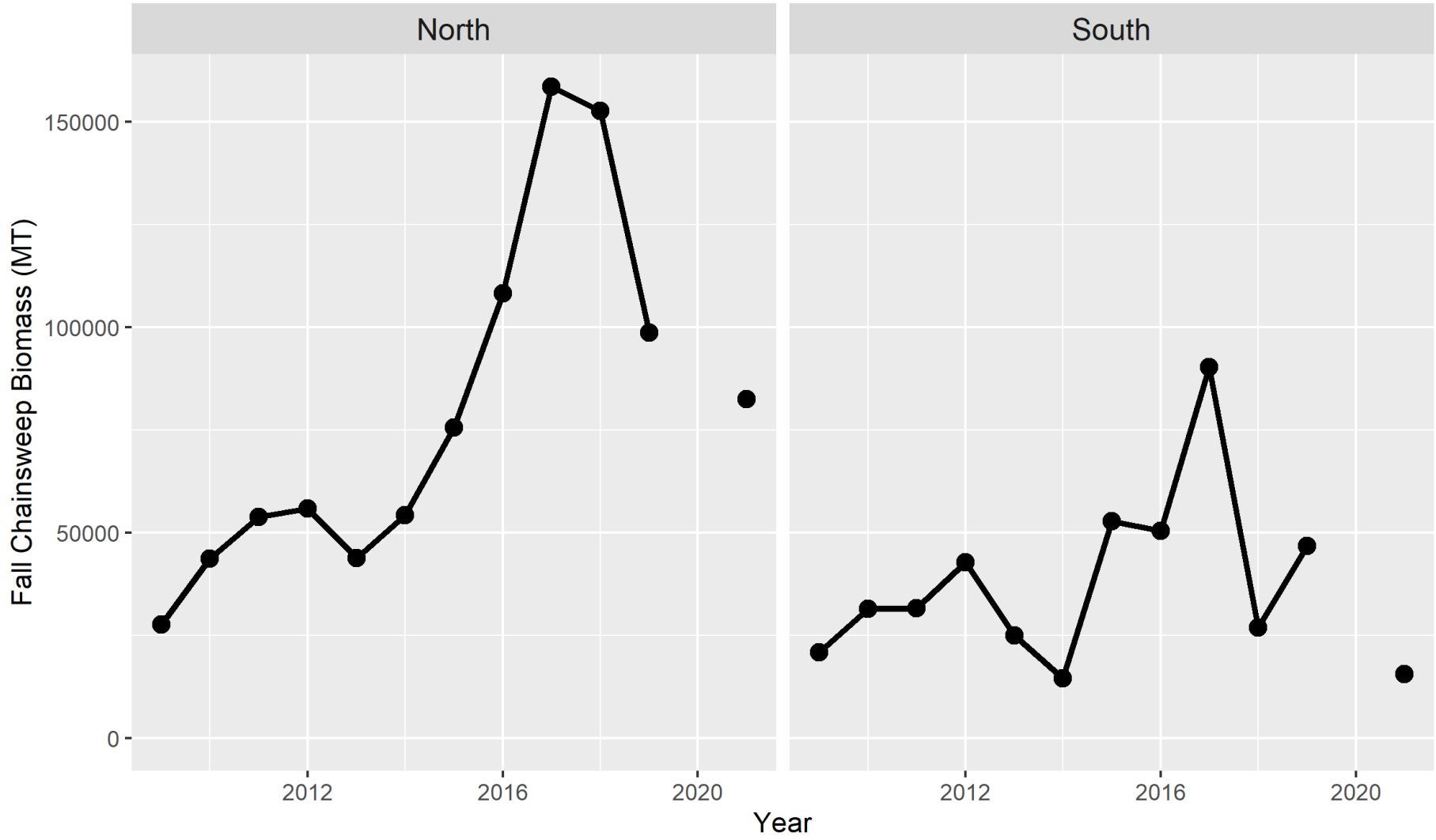
- Recruit indices





TOR 2: Evaluate Indices

- Chainsweep study derived biomass estimates



TOR 3: Estimate annual F, B, R, etc.

- No reliable ageing method, and so catch advice relies on a “Plan B”
- “Ismooth” (previously PlanBSmooth) was updated
- No 2020 survey observations
  - Leave missing, or
  - Impute with mean of surrounding years
- Supporting analyses (not presented here) demonstrated that imputing and using a mean of fall and spring surveys was superior to missing data points or using only one survey

TOR 3: Estimate annual F, B, R, etc.

- Imputing produced multipliers that better matched using all data, especially in the south, so that is what was used
- Analysis was repeated using only the fall survey but the resultant multipliers were imprecise and significantly different than using all data

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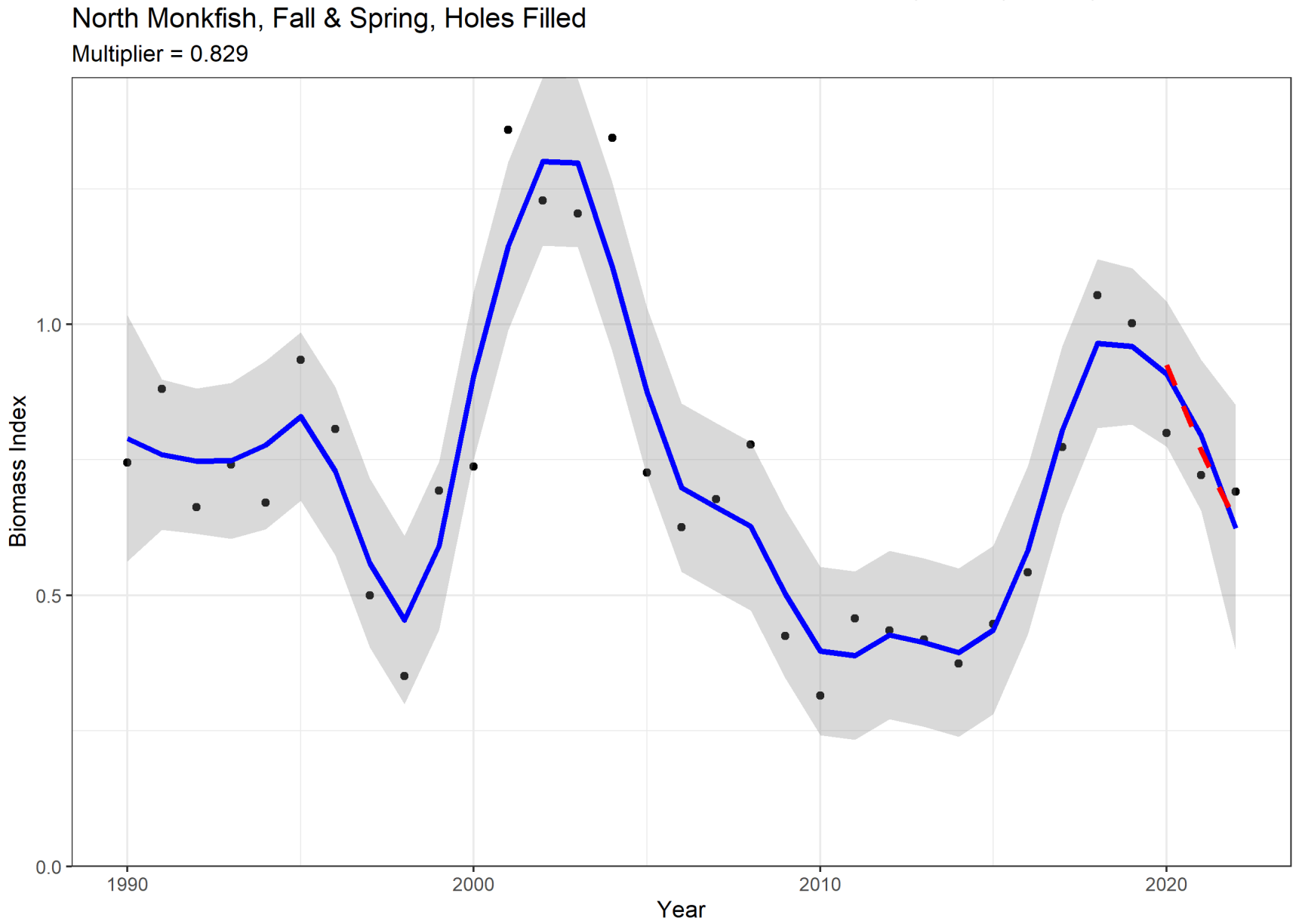

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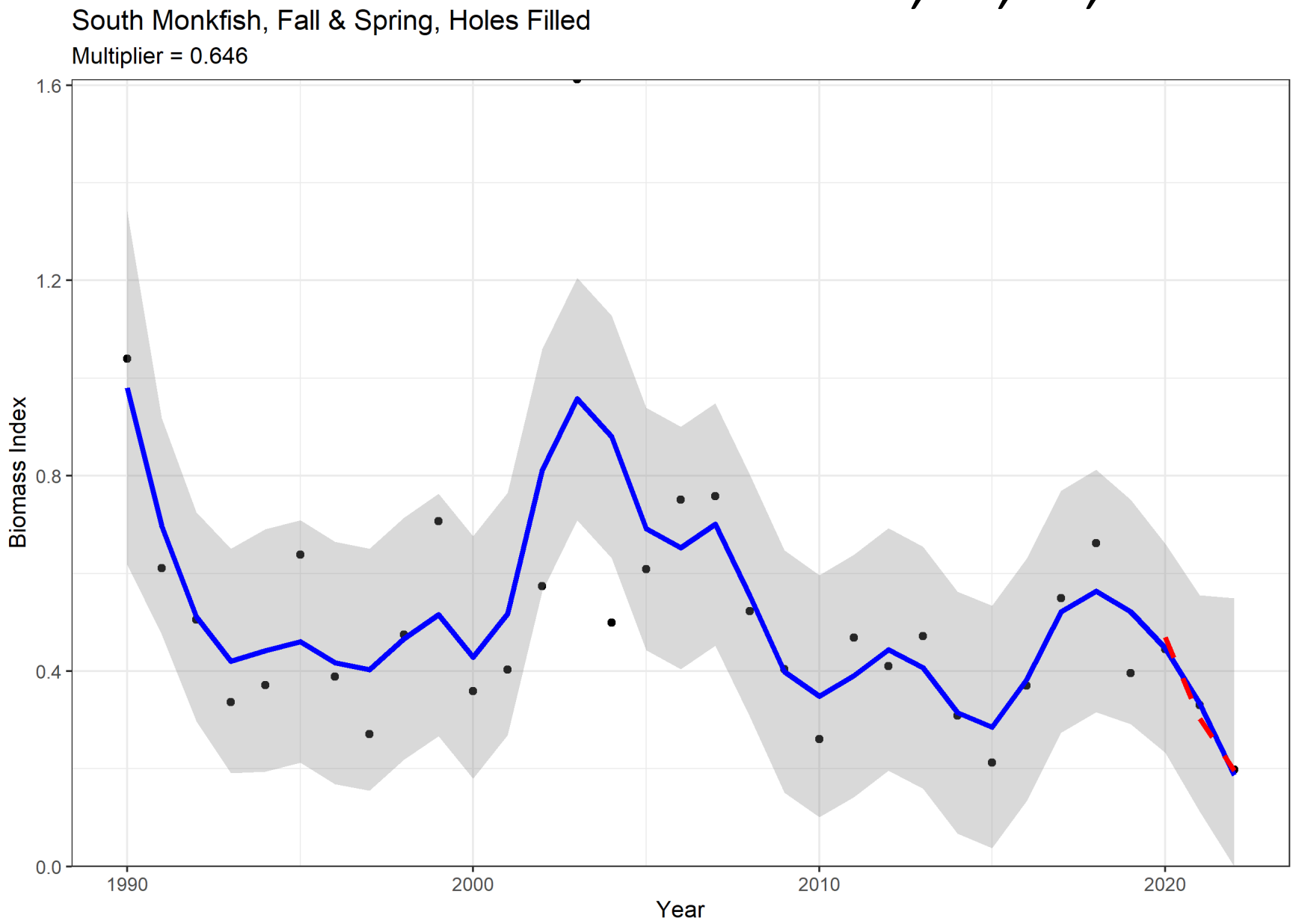

TOR 4: Update BRPs
TOR 5: Short-term projections

- Not applicable – stock status unknown

TOR 6: Respond to Previous Review Panel or SSC Concnerns

- A benchmark should consider using both observer data and port samples for length frequencies – **No progress**
- Ongoing research on age and growth
  - **No progress** – can we just give up on an ageing method?
- Better understanding of stock structure and movement – **No progress**
- Consider role of cannibalism in future modeling **– No progress**

Peer Review

- Suggested continued analysis related to growth as it may allow cohort tracking, acknowledging that an ageing method is unlikely
- Suggested consideration of a two-stage (e.g., delay difference) assessment at a future research track
- Ismooth approach and resultant multipliers accepted as basis for providing catch advice
- Lack of consensus on whether the multipliers should be applied to realized catches, existing ABC (method currently used), or other

Questions or Follow-up?