

ECOREGION **North Sea**
SUBJECT **EU–Norway request to ICES on the 2014 TAC for cod in the North Sea**

Advice summary

Reducing the cod TAC by 9% in 2014 relative to 2013 will likely result in increased cod discards, unless additional effort limitations or cod avoidance measures are implemented that will result in a reduction of the total catch of cod consistent with the reduction in the TAC.

ICES advises that a rollover TAC in 2014 can be considered precautionary if followed by implementation of the existing long term management plan and if sufficient additional measures are put in place that limit catches in 2014 to the levels specified in the short-term projection.

Within the timeframe for providing this advice, ICES has not been able to evaluate whether a 10% increase in the 2014 TAC relative to 2013 can be considered precautionary.

ICES concludes that TAC restrictions on landings alone are unlikely to be sufficient to achieve F_{MSY} in 2015. However, in all three management scenarios considered for 2014 (i.e. 9% reduction in TAC, rollover, and 10% increase) F might be reduced to F_{MSY} in 2015 if sufficient additional measures are put in place to limit catches to the levels specified in the short-term projections.

Request

The EU-Norway long term management plan for cod in the North Sea allows the Parties to fix a TAC that deviates from the plan's TAC setting rules where scientific advice indicates that this is justified in order to fulfil the objectives of the plan.

Given that the spawning biomass of the stock has increased in recent years, and is forecast to increase significantly in 2014, ICES is requested to advise on

a) Whether applying the 9% reduction of the TAC compared to 2013, as indicated by the plan, is likely to increase discards rather than reduce total catches.

b) Whether

i) a rollover or

ii) an increase of 10%

in the TAC for 2014 would be precautionary, and whether these options would be compatible with achieving a fishing mortality at F_{msy} by 2015.

Elaboration on the advice

a) Whether applying the 9% reduction of the TAC compared to 2013, as indicated by the plan, is likely to increase discards rather than reduce total catches.

Reducing the cod TAC by 9% in 2014 relative to 2013 implies a 46% reduction in F in 2014 compared to the two previous years 2012 and 2013 (ICES, 2013a). ICES considers that the fishing effort needed to catch the 2014 single-species fishing opportunities for cod is considerably smaller than the effort required to take the TACs for other demersal stocks caught in the same fisheries (ICES, 2013b). It is therefore likely that a reduction in the cod TAC by 9% will result in increased cod discards, unless additional effort limitations or cod avoidance measures are implemented that will result in a reduction of the total catch consistent with the reduction in the TAC.

- b) Whether i) a rollover or ii) an increase of 10% in the TAC for 2014 would be precautionary, and whether these options would be compatible with achieving a fishing mortality at F_{MSY} by 2015.

Conformity to ICES precautionary criteria

The current management plan is considered precautionary, assuming perfect implementation. A rollover of the TAC implies a fishing mortality in 2014 of 0.23 (ICES, 2013a) if catches are constrained so that discard rates do not increase and landings do not exceed the TAC. ICES evaluated the performance of the current management plan in October 2013, assuming a fishing mortality in 2014 of 0.23 (ICES, 2013c; Table 6.3.5.5.1) and concluded that the plan is precautionary. ICES therefore advises that a rollover TAC in 2014 can be considered precautionary if it is followed by implementation of the existing long-term management plan and if sufficient additional measures are put in place that limit catches in 2014 to the level specified in the short-term projection (ICES, 2013a).

ICES has, within the timeframe for delivering this advice, not been able to evaluate the performance of the current management plan when assuming a 10% increase in TAC in 2014 compared to 2013. However, ICES notes that a 10% increase in TAC corresponds to a fishing mortality in 2014 which is higher than the fishing mortality consistent with the management plan.

Achieving F_{MSY} by 2015

ICES currently uses $F = 0.19$ as the F_{MSY} proxy for North Sea cod (ICES, 2013a).

Short-term projections consistent with those provided by ICES in 2013 (O'Brien and Wilson, 2014; O'Brien and De Oliveira, 2014), which assume that discard rates remain the same as in recent years, have been carried out for 2014 to 2016. The projections consider a rollover TAC in 2015, after either a rollover or a 10% TAC increase in 2014. They show that if catches are constrained so that discard rates do not increase and landings do not exceed the TACs considered, F will be reduced to $F \leq F_{MSY}$ by 2015. However, consistent with its advice in 2012, ICES considers that the single measure of either a rollover TAC or increasing the cod TAC by 10% in 2014 relative to 2013 is likely to result in increased cod discards and therefore higher fishing mortalities than anticipated. Achieving such a restriction in catch may require that additional effort reductions and/or cod avoidance measures are implemented in addition to the TAC constraint on landings. ICES concludes that TAC restrictions on landings alone are unlikely to achieve F_{MSY} in 2015, but that F_{MSY} might be achieved if sufficient additional measures are put in place to control catch to the levels specified in the short-term projections (O'Brien and Wilson, 2014; O'Brien and De Oliveira, 2014).

References

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