

A comparison of the catch and fishing day statistics from the squid LTRAMP and NMLS databases.

J.P. Glazer and D.S. Butterworth

Introduction

Long-term rights were recently allocated to 109 companies with a total of 123 vessels in the squid jig fishery. An exercise was conducted to compare information provided in the LTRAMP application forms with that which is captured on the National Marine Linefish System (NMLS). This comparison applies only to the annual catches and days fished per company over the 2002-2004 period. Tables 1-4 present these comparisons and it is the last column, which indicates the percentage of the NMLS data that is reported in the LTRAMP database, that is most important.

Catch and Fishing days Comparison

Table 1 presents the annual catches for companies that do not share vessels with any other company.

Table 2 presents the annual catches for those companies that share one or more vessels.

Table 3 presents the annual fishing days for companies that do not share vessels with any other company.

Table 4 presents the annual fishing for those companies that share one or more vessels.

It was necessary to split the results into the two components (those that do and those that do not share vessels) because the NMLS database does not record data at a company level, but rather at a vessel level. This means that one cannot allocate catches or days fished on a company basis for vessels that are shared between two or more companies. A range of percentages that fully covers the extremes possible is therefore provided on the final column of Tables 2 and 4 to allow for this. For example if company A has 3 vessels (v_1 , v_2 and v_3) and company B has 2 vessels (v_2 , v_4), i.e. v_2 is shared, then the extreme lower and upper percentage limits possible for company A would be $(\frac{(v_1 + v_3)}{(v_1 + v_2 + v_3)}, \frac{(v_1 + v_2 + v_3)}{(v_1 + v_2 + v_3)})$ and for company B would be $(\frac{(v_4)}{(v_2 + v_4)}, \frac{(v_2 + v_4)}{(v_2 + v_4)})$, where the numerator refers to the NMLS database and the denominator to the LTRAMP database.

The following other assumptions/adjustments have been made:

- That the vessel codes reported in the respective databases are equivalent.
- That the annual catch and fishing days reported by companies in the LTRAMP applications apply to all vessels that were nominated to fish in the fishery (although in some cases certain nominated vessels were not accepted as part of the long term rights fleet).

- There were cases in the LTRAMP database where it was quite clear that the annual catches reported were not in tons as requested. Appropriate conversions were applied in such cases.

In each Table cells in the final column are highlighted if the percentage is lower than 95%. It is obvious from the number of shaded cells that very few of the companies have provided catch and sea day information in the LTRAMP application forms that is not clearly inconsistent with the information that is contained in the NMLS database as indicated by the statistics reported in the blue books submitted by the vessels. Either these companies have falsified the information provided in their rights application submissions, or they have not complied fully in the past with permit requirements to report all their catches and fishing activities – either instance would seem to constitute a breach of the law.