

1. Has ADF&G seen a substantial increase in participation and effort during the time span of 2019 – 2022?

As the Commercial Fisheries Entry Commission summarized in their letter to permit holders, participation, and effort in the Prince William Sound (PWS) spot shrimp fishery did significantly increase when 2019-2022 years are compared with earlier years of the modern fishery. However, participation has been stable during the years 2019-2022. The number of participants in the fishery ranged from 75 in 2021 and 2023 to 64 in 2024, though the 2024 season is still underway. Effort has also been stable, ranging from 44,000 pot lifts in 2021 to 34,000 pot lifts in 2019. Effort is dependent on which area is opened to commercial fishing. Years in which Area 3 is open have higher effort due to lower catch per unit effort when compared with Areas 1 and 2.

- a. If so, what factors may be causing this increase?

Increased participation from 2019-2022 vs earlier years in the modern fishery reflects a period of increased productivity for PWS spot shrimp as illustrated in Alaska Department of Fish and Game (department) survey results.

- b. Does ADF&G think that these factors will continue?

Survey results indicate that spot shrimp in PWS have entered a period of low productivity, which is reflected in decreasing guideline harvest levels from 2022-2024. Participation in 2023 remained high, at 73 participants, but in 2024 participation has dropped to 64.

2. Does ADF&G have management concerns for the shrimp resources in this fishery?

There are no management concerns that are unique to the commercial shrimp fishery. The department has adequate tools to manage the commercial fishery inseason so that GHs are not exceeded. Harvest reporting is required by regulation and is timely and accurate. Assessment results show that the shrimp stock in PWS has been declining in recent years, however the department has management tools necessary to constrain effort, track harvest inseason, and not exceed the guideline harvest level.

3. Are changes in participation and effort causing resource conservation and management concerns?

- a. If so, what measures has ADF&G taken in reaction to the new effort?

No, despite an increase in participation between 2018 and 2019 there are no resource conservation and management concerns associated with the commercial fishery.

4. Does ADF&G anticipate further growth in participation and effort in the PWS pot shrimp fishery if a limited entry program is not implemented?

There are no indications that participation and effort will increase in the absence of a limited entry program. In 2024 participation dropped to 64 permit holders, likely because the GH was significantly reduced, and shrimp are in a period of lower productivity. However, during times of low groundfish prices participants in other fisheries may seek new opportunities and there is always the possibility of effort shifting to the shrimp fishery.

5. Would limiting the number of participants in the fishery help ADF&G manage the fishery for resource conservation?

Total allowable harvest (TAH) for the PWS spot shrimp fishery is estimated from a model that takes harvest and survey results into account. If the estimated TAH is below 110,000 pounds a commercial fishery cannot open. Conservation of the resource does not hinge on the number of participants at current levels of effort. The department could manage the shrimp fishery at higher effort levels than are currently seen in PWS. For example, in Southeast Alaska, some management areas where spot shrimp are harvested, have higher levels of effort with lower GHF than PWS, indicating that the PWS fishery could be managed at higher levels of effort as well.

6. Would limited entry combined with current regulations effectively serve to constrain effort in the pot shrimp fishery?

Limited entry would remove the potential for increased effort in the fishery. However, current levels of participation are similar to the proposed number of limited entry permits (70 participants 2019-2022 average vs 63 proposed limited entry permits, and 64 participants in 2024), indicating that effort would not be constrained significantly based on the number of participants at this time.

7. Does ADF&G have any other thoughts or information that should be brought to bear on the limitation question?

Limiting entry to a commercial fishery should be considered only when other management measures have proven inadequate to conserve the resource. While limited entry would not aid significantly in management of the spot shrimp fishery it might be of benefit to those that qualify for a limited entry permit. As shrimp enter a period of lower productivity removing the potential for increased effort would allow permit holders willing to stick out a season to harvest more shrimp. One factor that CFEC should consider is that many participants in the fishery do not fish for the entire season. Participation is generally highest within the first two weeks, after which part-time participants or those that move on to other fisheries drop out. This trend would most likely not change if limited entry were to be implemented as participation from 2019-2022 is not much higher than the proposed number of permits, and equal to the proposed number of permits in 2024. The PWS shrimp fishery is an entry-level opportunity for commercial fishermen and there are additional management and conservation tools that could be adopted by the Alaska Board of Fisheries or department if current measures prove inadequate to conserve the resource.