

答案請填寫於試卷內，附上題號，並依序作答。可用英文或中文回答。

1. (25 分) Data used in stock assessments can be categorized as either fishery-dependent or fishery-independent. Please explain and give examples of the two types of data.
2. (25 分) Please explain what the catch-per-unit-effort (CPUE) standardization is and how to conduct it.
3. (20 分) Please explain the concepts of the maximum sustainable yield (MSY) and the density-dependent population growth.
4. (30 分) The following figure is a Kobe plot which commonly be used to determine the status of a fish stock. Please explain the meanings of the quadrants I-IV in the figure. What is the stock status in 2013 based on the Kobe plot?

