Comments from Public Consultation on ECV Requirements 13/01 – 13/03 2020 for:

# Ocean oxygen

## ECV Product: Dissolved oxygen concentration

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| **Name** | Dissolved oxygen concentration | | | | |
| **Definition** | Concentration of dissolved oxygen (O₂) in the water column | | | | |
| **Unit** | μmol kg⁻1 | | | | |
| **Note** | This EOV/ECV is a measurement of sub-surface dissolved oxygen (O₂) concentration in the ocean, expressed in units of umol kg⁻¹. Data on dissolved oxygen is obtained by both discrete (chemical analysis) and continuos (sensor measurements) sampling performed on a number of observing platforms (ship-based, fixed-point, autonomous). | | | | |
| **Requirements** | | | | | |
| **Item needed** | **Unit** | **Metric** | **[1]** | **Value** | **Derivation and References and Standards** |
| **Horizontal Resolution** | km |  | G | 300  Coastal: 1-100 | For global coverage, spatial resolution refers to distance between transects, not between sampling stations. |
| B |  |  |
| T | 2000  Coastal: 300 |  |
| **Vertical Resolution** |  |  | G |  |  |
| B |  |  |
| T |  |  |
| **Temporal Resolution** |  |  | G | Monthly |  |
| B |  |  |
| T | decadal |  |
| **Timeliness** | Month |  | G | 6 |  |
| B |  |  |
| T | 12 |  |
| **Required Measurement Uncertainty** | μmol kg⁻¹ |  | G | 0.5 | . |
| B |  |  |
| T | 2 |  |
| **Stability** |  |  | G |  |  |
| B |  |  |
| T |  |  |
| **Standards and References** | Requirements based on characteristic scales and magnitude of signal of phenomena to observe. See the EOV Specification Sheet for details and references ([www.goosocean.org/eov](http://www.goosocean.org/eov)). | | | | |
| **Adaptation and Extremes** | | | | | |
|  | Relevant? (Yes/No) | Sugg. Req. sufficient? (Yes/No) | Explanation | | |
| **Adaptation[2]** |  |  |  | | |
| **Extremes[3]** |  |  |  | | |
| **Adaptation and Extremes** | | | | | |
|  | Relevant? (Yes/No) | Sugg. Req. sufficient? (Yes/No) | Explanation | | |
| **Adaptation[4]** |  |  |  | | |
| **Extremes[5]** |  |  |  | | |

[1]Goal (G); Breakthrough (B)(not mandatory, more as one possible); Threshold (T), for definitions see [Guidelines](http://tiny.cc/ecv-review)

[2] Is the ECV Product directly relevant to support Climate Adaptation?

[3] Can the ECV Product be used to monitor climate extremes or aspects of extremes?

[4] Is the ECV Product directly relevant to support Climate Adaptation?

[5] Can the ECV Product be used to monitor climate extremes or aspects of extremes?

NO COMMENT