

## AI Weather Quest- Model summary questionnaire

To be eligible for end-of-period recognition, participating teams must respond to the following questions for each of their models during the final four weeks of each competition period. Once periodic awards have been granted, **this information will be displayed on your team's public profile.**

1. Which of the following descriptions best represent the overarching design of your forecasting model? *(Select all that apply – multiple choices allowed):*
  - a. Post-processing of numerical weather prediction (NWP) data.
  - b. Machine learning-based weather prediction.
  - c. Statistical model focused on generating quintile probabilities.
  - d. Hybrid model that integrates physical simulations with machine learning or statistical techniques
  - e. An empirical model that utilises historical weather patterns.
  - f. Ensemble-based model, aggregating multiple predictions to assess uncertainty and variability.
  - g. Other (please specify).
2. What techniques did you use to initialise your model? *(For example: data sources and processing of initial conditions)*
3. If any, what data does your model rely on for real-time forecasting purposes?
4. What types of datasets were used for model training? *(For example: observational datasets, reanalysis data, NWP outputs or satellite data.)*
5. Please provide an overview of your final ML/AI model architecture? *(For example: key design features, specific algorithms or frameworks used, and any pre- or post-processing steps.)*
6. Have you published or presented any work related to this forecasting model? If yes, could you share references or links?
7. Before submitting your forecasts to the AI Weather Quest, did you validate your model against observational or independent datasets? If so, how?
8. Did you face any challenges during model development, and how did you address them?
9. Are there any limitations to your current model that you aim to address in future iterations?
10. Are there any other AI/ML model components or innovations that you wish to highlight?
11. Who contributed to the development of this model? *(Optional) Please list all individuals who contributed to this model, along with their specific roles (e.g., data preparation, model architecture, model validation, etc.) to acknowledge individual contributions.*