

MYP Science Assessment Rubric

	Criteria	6-5	4-3	2-1	0
A	One World	The student explains how science is applied to addressing a specific local or global issue. The student explains some of the benefits and limitations of science in solving the issue. The student discusses how science and its applications interact with some of the following factors: social, economic, political, environmental, cultural and ethical.	The student describes how science is applied to addressing a specific local or global issue. The student describes some of the benefits or limitations of science in addressing the issue. The student describes how science and its applications interact with at least one of the following factors: social, economic, political, environmental, cultural and ethical.	The student describes how science is applied to addressing a specific local or global issue. The student states some of the benefits or limitations of science in addressing the issue.	The student does not reach a standard described by any of the descriptors given below.
B	Communication in Science	The student communicates scientific information effectively using scientific language correctly . The student presents all the information appropriately using symbolic and/or visual representation accurately according to the task. The student acknowledges sources of information appropriately .	The student communicates scientific information using scientific language . The student presents most of the information appropriately using symbolic and/or visual representation according to the task. The student acknowledges sources of information with occasional errors .	The student attempts to communicate scientific information using some scientific language . The student presents some of the information in an appropriate form using some symbolic or visual representation when appropriate. The student attempts to acknowledge sources of information but this is inaccurate .	The student does not reach a standard described by any of the descriptors given below.
C	Knowledge and Understanding of Science	The student explains scientific ideas and concepts and applies scientific understanding to solve problems in familiar and unfamiliar situations . The student analyzes and evaluates scientific information by making scientifically supported judgments about the information, the validity of the ideas or the quality of the work.	The student explains scientific ideas and concepts and applies scientific understanding to solve problems in familiar situations . The student analyzes scientific information by identifying parts, relationships or causes. The student provides an explanation that shows understanding.	The student recalls some scientific ideas and concepts and applies these to solve simple problems .	The student does not reach a standard described by any of the descriptors given below.
D	Scientific Inquiry	The student defines the purpose of the investigation, formulates a testable hypothesis and explains the hypothesis using scientific reasoning. The student identifies the relevant variables and explains how to manipulate them. The student evaluates the method commenting on its reliability and/or validity . The student suggests improvements to the method and makes suggestions for further inquiry when relevant.	The student defines the purpose of the investigation and provides an explanation/prediction , but this is not fully developed. The student acknowledges some of the variables involved and describes how to manipulate them. The method suggested is complete and includes appropriate materials/equipment. The evaluation of the method is partially developed .	The student attempts to define the purpose of the investigation and makes references to variables but these are incomplete or not fully developed, the method suggested is partially complete . The evaluation of the method is either absent or incomplete .	The student does not reach a standard described by any of the descriptors given below.
E	Processing Data	The student organizes and transforms data into numerical and diagrammatic forms and presents it logically and clearly using appropriate communication modes. The student explains trends, patterns or relationships in the data, comments on the reliability of the data, draws a clear conclusion based on the correct interpretation of the data and explains it using scientific reasoning .	The student organizes and transforms data into numerical and diagrammatic forms and presents it using appropriate communication modes . The student draws a conclusion consistent with the data .	The student organizes and presents data using simple numerical or diagrammatic forms and draws an obvious conclusion .	The student does not reach a standard described by any of the descriptors given below.
F	Attitudes in Science	The student works largely independently ; uses equipment with precision and skill; pays close attention to safety and deals responsibly with the living and non-living environment. The student consistently works effectively as part of a team , collaborating with others and respecting their views.	The student uses most equipment competently but might require occasional guidance; on most occasions pays attention to safety and works responsibly with the living and non-living environment. The student generally cooperates well with other students.	The student requires guidance and supervision when using laboratory equipment. The student can work safely and cooperate with others but may need reminders .	The student does not reach a standard described by any of the descriptors given below.