Science Fair Rubric

Design	**3**	**2**	**1**	**Score Earned**
Defined problem and selected variables	Formulates a focused problem/research question and identifies the relevant variables.	Formulates a problem/research question that is incomplete **or** identifies only some relevant variables.	Does not identify a problem/research question **and** does not identify any relevant variables.	
Controlling variables	Designs a method for the effective control of the variables.	Designs a method that makes some attempt to control the variables.	Designs a method that does not control the variables.	
Developing a method for collection of data	Develops a method that allows for the collection of sufficient relevant data.	Develops a method that allows for the collection of insufficient relevant data.	Develops a method that does not allow for any relevant data to be collected.	
Data collection and processing				
Recording raw data	Records appropriate quantitative and associated qualitative raw data, including units and uncertainties where relevant.	Records appropriate quantitative and associated qualitative raw data, but with some mistakes or omissions.	Does not record any appropriate quantitative raw data **or** raw data is incomprehensible.	
Processing raw data	Processes the quantitative raw data correctly.	Processes quantitative raw data, but with some mistakes and/or omissions.	No processing of quantitative raw data is carried out **or** major mistakes are made in processing.	
Presenting processed data	Presents processed data appropriately and, where relevant, includes errors and uncertainties.	Presents processed data appropriately, but with some mistakes and/or omissions.	Presents processed data inappropriately **or** incomprehensibly.	

Conclusion and evaluation				
Conclusion	States a conclusion, with justification, based on a reasonable interpretation of the data.	States a conclusion based on a reasonable interpretation of the data.	States no conclusion **or** the conclusion is based on an unreasonable interpretation of the data.	
Evaluation procedures	Evaluates weaknesses and limitations.	Identifies some weaknesses and limitations, but the evaluation is weak or missing.	Identifies irrelevant weaknesses and limitations.	
Improving the investigation	Suggests realistic improvements in respect of identified weaknesses and limitations.	Suggests only superficial improvements.	Suggests unrealistic improvements.	
Presentation				
Display Board	Board is organized in a logical, professional, visually pleasing format and all important information is easy to find and read.	Board is presented in a manner that meets basic standards and provides necessary information, but presentation of material has obvious room for improvement.	Board appears poorly planned and developed creating a negative impression of the overall project or otherwise failed to meet expectations.	
Oral presentation	Presentation fit within allotted time, seemed well planned, presented key information in an understandable manner and generated interest in project.	Presentation met basic expectations.	Presentation failed to meet expectations.	
				Total Score

Note: This rubric is based on the assumption the student has properly completed all required ISEF paperwork and followed all science fair rules and procedures. Failure to satisfy this assumption may result in a lowered grade or rejection of the project.