WBRSF Judging Rubric

PROJECT #:

_____

Student Name(s):

_____

Project Title:

_____

_____

PART A: Communication

Summary and Video: Effective communication and presentation skills should be evident in both the video and summary. Scientific thought, innovation, thoroughness, understanding and effort should be integral to both elements.									
Level 1 (low) Score Range 0-5		**Level 2 (fair)** Score Range 5-10		**Level 3 (good)** Score Range 10-15		**Level 4 (excellent)** Score Range 15-20		Mark
0	5	5	10	10	15	15	20	
The summary and video are insubstantial or incomplete. There is little evidence of attention to effective communication. In a group project, one member may have made a stronger contribution to the presentation.		The summary and video are simple. There is little in the video and summary that captures interest. In a group project, one member may have a slightly stronger contribution to the presentation.		The summary and video are complete and demonstrate attention to detail and substance. The video and summary are each well thought out and executed. In a group project, all members made and equal contribution to the presentation		The summary and video are complete and exceed reasonable expectations of a student at this age/grade. The video is logical and self-explanatory, and the summary is concise and well presented. In a group project, all members contributed equally and effectively to the presentation.		Note space.

PART B: Initiate and Plan, Perform and Record

WHY? and HOW?: This section assesses the following criteria: project structure; correctness of research methodology; scientific thought and understanding; correspondence of the content to the topic, goals, and objectives; technical skills; thoroughness and effort; accordance of conclusions to results obtained; and academic or practical value.									
Level 1 (low) Score Range 0-5		**Level 2 (good)** Score Range 5-15			**Level 3 (excellent)** Score Range 15-25			Mark
0	5	5	10	15	15	20	25	
DISCOVERY – Replicate a known experiment to confirm previous findings or slightly extend a known experiment with modest improvements to procedures, data gathering, and possible applications. INNOVATION – Improve/Demonstrate new applications for existing technological systems, social or behavioural interventions, existing physical theories or equipment.		DISCOVERY – Devise and carry out and original experiment. Identify the significant variables and attempt to control them. Analyse the results using appropriate arithmetic, graphical or statistical methods. INNOVATION – Design and build innovative technology; or provide adaptations to existing technology or to social or behavioural interventions; extend or create new physical theory. Human benefit, advancement of knowledge and/or economic applications should be evident.			DISCOVERY - Devise and carry out original experiment research in which most significant variables are identified and controlled. The data analysis is thorough and complete. INNOVATION – Integrate several technologies, inventions, social/behavioural interventions or design and construct and innovative application that will have human and/or commercial benefit.			Note space.

PART C: Analyze and Interpret

SO WHAT? and WHAT'S NEXT?: This section assesses the conclusions that have been drawn from the project. In "So what?" students are expected to think critically about the outcomes of their project, analyzing and interpreting data or evaluating a method of prototype. In "What's Next?" students propose future work or improvements

Level 1 (low) Score Range 0-15			**Level 2 (good)** Score Range 15-30			**Level 3 (excellent)** Score Range 30-45			Mark
5	10	15	20	25	30	35	40	45	
DISCOVERY – Discussions are speculative or missing. Conclusions are unsupported by the data or missing. Conclusions are poorly or not described/presented or are not connected back to the data. Statements about the significance of the work are missing, overstated or show little or no awareness of context. Suggestions for future work are unrealistic and unrelated to the results of the current project. INNOVATION – Performance of the prototype or method is not evaluated (merely described). No comparisons are made to alternative or previous solutions. Statements about the significance of the work (including human benefit/advancement of knowledge/economic applications) are overstated or unsupported by the information presented and show little or no awareness of context. Suggestions for future developments/versions are unrealistic and unrelated to the outcomes of the current project.			DISCOVERY – Discussions are based around the data and address most aspects of the data. Conclusions are mostly supported by the data. Conclusions are drawn from most aspects of the investigation. Conclusions are described/presented and are somewhat connected back to the data that justifies them. Statements about the significance of the work (including human benefit/advancement of knowledge/economic applications) are somewhat supported by the information presented and show some awareness of context. Suggestions for future work are reasonable and at least partly justified by the results of the current project. INNOVATION – Performance of the prototype or method is partially evaluated; some questions remain. Some comparisons are made to alternative or previous solutions. Statements about the significance of the work (including human benefit/advancement of knowledge/economic applications) are mostly supported by the information presented and show some awareness of context. Suggestions for future developments/versions may overreach and are somewhat connected to the outcomes of the current project.			DISCOVERY – Discussions are clearly based around the data and address all aspects of the data. Conclusions are supported by the data. Conclusions are drawn from all aspects of the investigation. Conclusions are clearly described/presented and connected back to the data that justifies them. Statements about the significance of the work (including human benefit/advancement of knowledge/economic applications) are supported by the information presented and show awareness of context. Suggestions for future work are realistic and justified by the results of the current project. INNOVATION – Performance of the prototype or method is evaluated completely and realistically. Honest comparisons are made to alternative or previous solutions, where possible. Statements about the significance of the work (including human benefit/advancement of knowledge/economic applications) are supported by the information presented and show awareness of context. Suggestions for future developments/versions are realistic and justified by the outcomes of the current project.			Note space.

PART D: Presentation

Measure	**Range**	**Score**
1. Skill		
Necessary scientific skills shown.	0-2	
Logbook present with evidence of use.	0-1	
2. Display		
Spelling and grammar correct.	0-1	
Exhibit well constructed and attractive.	0-2	
Layout logical and self-explanatory	0-2	
3. Dramatic Value		
Clear logical enthusiastic presentation	0-2	
Total Display Score	0-10	

Score Summary:

Part A: Communication	Part B: Initiate and Plan, Perform and Record	Part C: Analyze and Interpret	Part D: Presentation	Total:
/20	/25	/45	/10	/100

Comments (For judge's use only, this will not be shared with participants):

Strengths

_____

_____

Weaknesses

_____

_____

Judge Name (please print): _____ Signature: _____