

ALLEN MIDDLE SCHOOL

6TH GRADE TECH. ED. MAG-LEV VEHICLE PROJECT

The Assessments

Adherence to design: The vehicle can easily be recognized in the drawing; the placement and scale of the components of the vehicle match the design drawing; parts are not added or deleted; shapes are consistent with the design drawing

Construction: Components are securely attached to each other and the platform; vehicle components do not extend beyond each platform side in a manner which would interfere with vehicle fitting on track; wind-catching components are perpendicular to the airflow and/or situated so that airflow will move vehicle straight down the track; the vehicle is symmetrical

Propulsion: Vehicle moves freely on the track, it does not stick or tip over; airflow does not cause wind-catching device to fold, flap, turn, come off, or tip over; airflow pushes vehicle down track without pushing it up the side of the track

Rubric number = grade

12=100%	11=97%	10=95%	
9=92%	8=89%	7=86%	
6=84%	5=81%	4=79%	
3=75%	2=71%	1=69%	0=60%

Assessment Rubric					
Student Name:				Grade 6	
Assignment: Maglev Vehicle					
	4	3	2	1	Teacher's Rating
	Excellent	Good	Fair	Poor	
Criteria 1 – Adherence to design	vehicle construction precisely matches design	vehicle shape matches design; size and scale of parts are changed	vehicle is similar to design; parts have been added or deleted	vehicle does not resemble design drawing	
Criteria 2 – Construction	vehicle is well-constructed and symmetrical; components are firmly attached: wind-catching surfaces will send the vehicle straight down the track; vehicle fits on track	vehicle has one of the following: it is not symmetrical; wind-catching surfaces are not perpendicular to airflow; it does not fit on track	vehicle has two of the following: it is not symmetrical; wind-catching surfaces are not perpendicular to airflow; it does not fit on track	vehicle is not symmetrical; parts are not attached to each other or to the platform	
Criteria 3 – Propulsion	vehicle moves freely down the track; it does not tip over or ride up the side; wind-catchers stay in place	vehicle sticks on track or it tips over; it does not ride up the side; wind-catchers stay in place	vehicle moves freely down the track; it does not tip over or ride up the side; wind-catchers are not tight and fold or flap in airflow	vehicle starts down track and then rides up the side	
			total pts. = grade →		