	Potential Effects	Potential Effects of Failures	Severity	Classification	Potential Cause(s) of Failure	Occurrence	Current Design Controls (Preventions)	Current Design Control (Detection)	Detection	RPN	Recommended Action(s)
1 1 1 "	ubber on Attachment : ir slides off	lead to injury of the	3		Abnormal amount of weight applied on the bar	2	None	None	5	30	
2 Tin	ming belt fails	The base plate would stop moving, the person can fall of the plate, and can cause potential damage the motor and poteniometer	4		Too much strain on the belt, too much force applied on the belt from the tension spring	3	None	None	5	60	
3 Ele	ectromagnets failing	Can cause injury to the participant and other people. Damaging other electrical componets	3		The electromagents are too strong, the electromagnet swinging, and wires getting caught in the pulley.	5	None	Attemping to design a case for the weights (that is attached to the magnets), using different material	4	60	
4 GU	UI communication	the GUI isn't making proper contact with the Ardunio	2		The GUI isn't hooked up correctly, there is a computer system failure, or there is a bug in the layout.	3	None	None	3	18	
5 Toi	orque arm	Can cause injury to the participant and other people. Damaging other componets	5		If the telescoping tube falls out or if the head piece isn't mounted correctly	2	None	None	3	30	
6 Hai	arness(s)	Inaccurate data	3		If the harness isn't put on correctly, the harenss isn't the correct size, or the seams break	2	None	None	3	18	
Total										216	

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Responsibility and Target Completion Date	Actions Taken	Severity	Occurrence	Detection	RPN
					0
					0
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					0
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