

CrutchGuard

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Team



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Problem Statement

In the United States, approximately 575,000 people are prescribed crutches annually. However, there exists a concerning lack of awareness regarding the potential dangers associated with using crutches on wet or uneven surfaces. In a study from 2010, it was found that there were 70,000 crutch related injuries. When a patient falls while using their crutches in such conditions, it could lead to the reinjury of their already compromised area or result in additional injuries to other parts of the user's body.

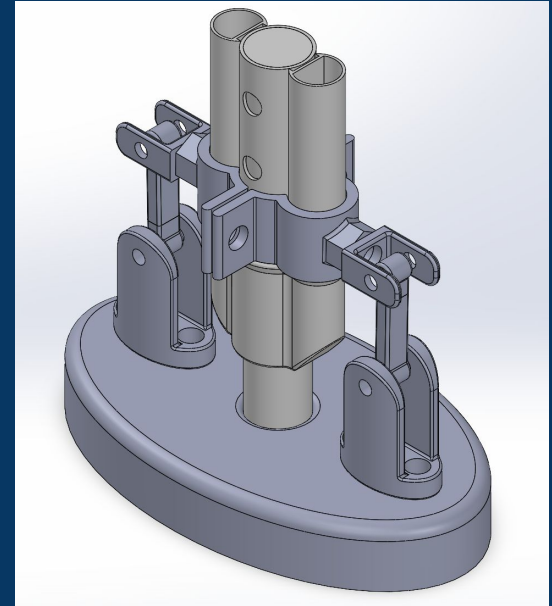
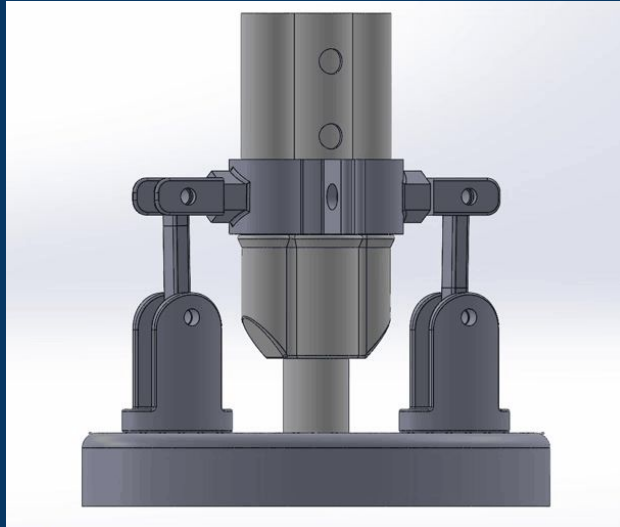
Solution

What if people can use crutches on rough or slippery surfaces with little to no reinjury risk?








Our Idea

Our solution is an engineered attachment for the bottom of the crutch that includes a textured bottom for grip and an increased surface area to improve stability.



Differentiation

| | Existing Products | Our Product |
|-------------------------------------|---|---|
| Customizable for different crutches |  |  |
| Versatility |  |  |
| Durability |  |  |
| Grip & Stability for all surfaces |  |  |

Implication

- As a result of this work, we can look forward to transforming the overall crutch landscape
- Would help mitigate injuries for the 12% of crutch users who get injured during usage



Questions?