

1. Introduction

Cleaning machines were located throughout KTPH in their respective work areas. This hindered redeployment in exceptional events.

Time was wasted just by locating machines for **redemption**, resulting in **delayed reaction time** especially during heavy rain.

To reduce time taken for deployment, two main **satellite parking areas** were created and organised with **shadowboards** for clarity.

2. Methodology

Machines were relocated to the identified **satellite parking areas** at Basement 1 and Tower B Level 4.

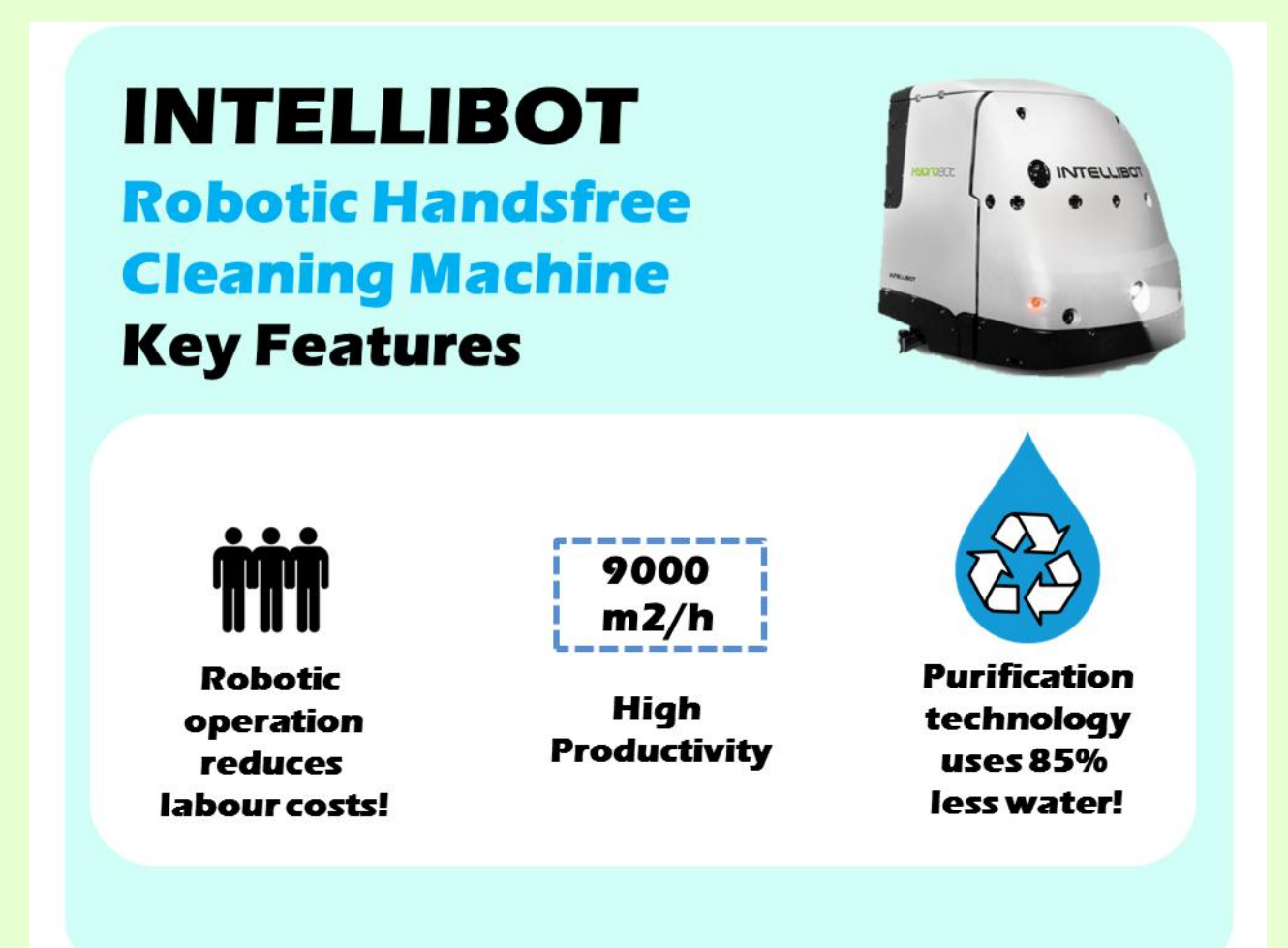
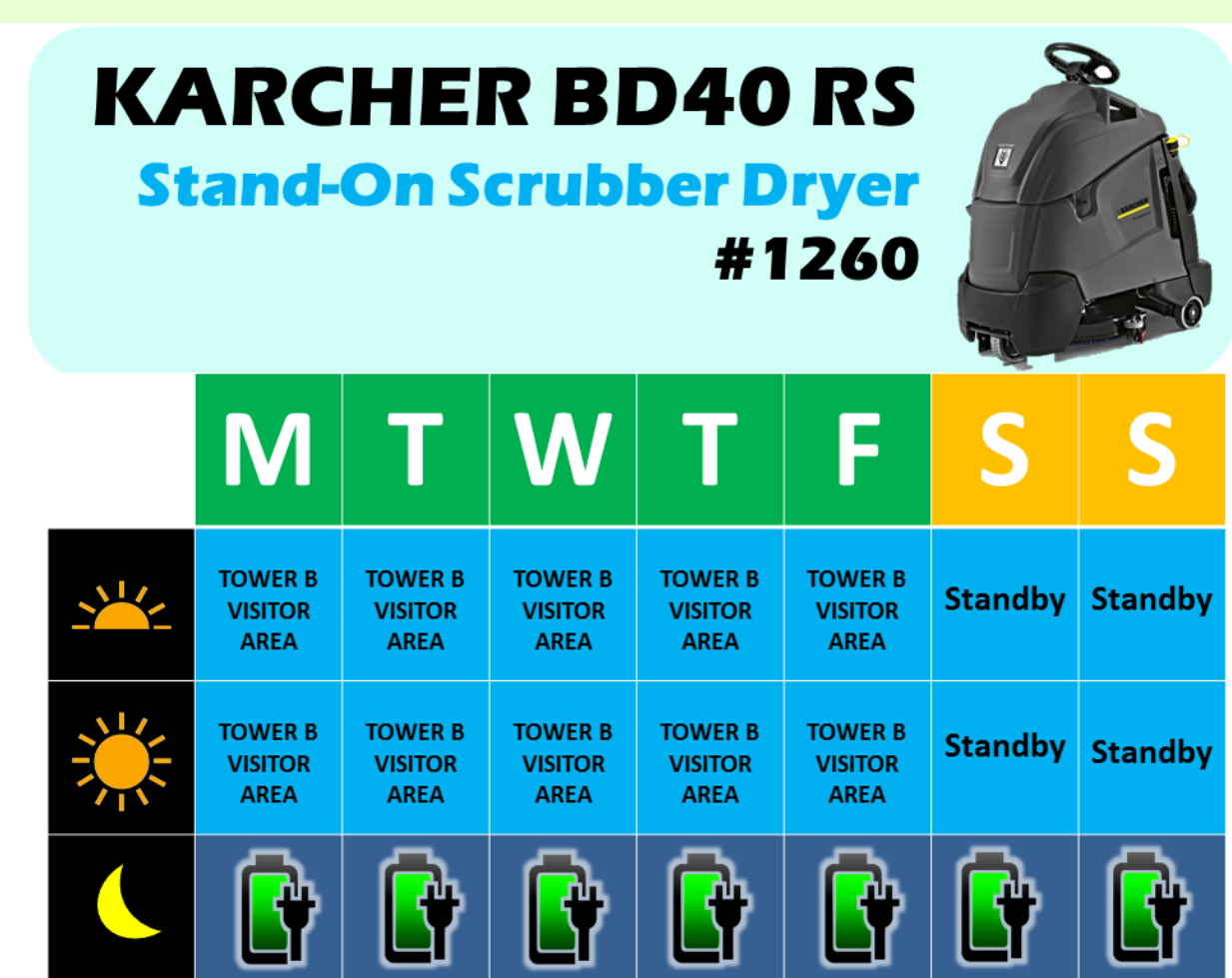
Shadowboarding was also put up to indicate serial numbers as well as **work and charging cycles**.

3. Results



Time taken to deploy the machines was **reduced by 50%**.

Before		After	
Areas	Reaction Time	Areas	ReactionTime
B105	30 mins	B1	10-15 mins
B2			
B1			
4			



Shadowboarding has made the management of machines more **visual**, ensuring that deployment and charging cycles are **adhered to** for **better maintenance**.

4. Conclusion

Deployment time of cleaning machines was reduced by **50%**

This reduced response time translates into **improved safety** for visitors and patients by keeping **floor surfaces dry** during heavy downpours and thus **minimising the possibility of slip and fall incidents**.