



WHL Race



POWERED WHEELCHAIR RACE

In this race, pilots with a severe walking disability compete against each other in a motorized wheelchair. The wheelchairs feature innovative technologies to overcome obstacles such as stairs or doors.

CHALLENGES FOR 2020

The door in the Ramp & Door task now needs to be opened and closed using an externally powered technical support (e.g. robotic arm). The stairs meanwhile have now six instead of three steps on both sides that have to be overcome. Furthermore, a required standstill on the way down is intended to demonstrate control over the wheelchair.

Time Limit
8 minutes



Task Name	Table	Slalom	Rough Terrain	Stairs	Tilted Path	Ramp & Door
Points (Total: 100)	16	15	17	18	14	20
Task Description	Drive up to the left-hand table until half of the thighs are covered without displacing the table	Drive through between each pair of furniture without displacing them	Cross uneven terrain	Ascend and descend stairs; bring wheelchair to a standstill while descending	Drive across tilted path with different surfaces (sanded wood and artificial grass)	Drive the ramp up and down; open and close the door using an externally powered technical support (e.g. a robotic arm)
Challenge	Size and seat height of the wheelchair	Size of the wheelchair; precise manoeuvrability	Grip of the wheels; ground clearance; power	Ability to climb and descend stairs in a controlled manner; power	Drifting and tipping stability; power	Precise manoeuvrability and control of technical support; manoeuvre in a confined space
Scoring	1. Whoever achieves the highest score by solving the tasks is the race winner. 2. In case of a tied score between two or more pilots, the pilot with the lowest total time is the race winner.			Main Competition Rules The pilot may skip tasks, but cannot return to them later.		