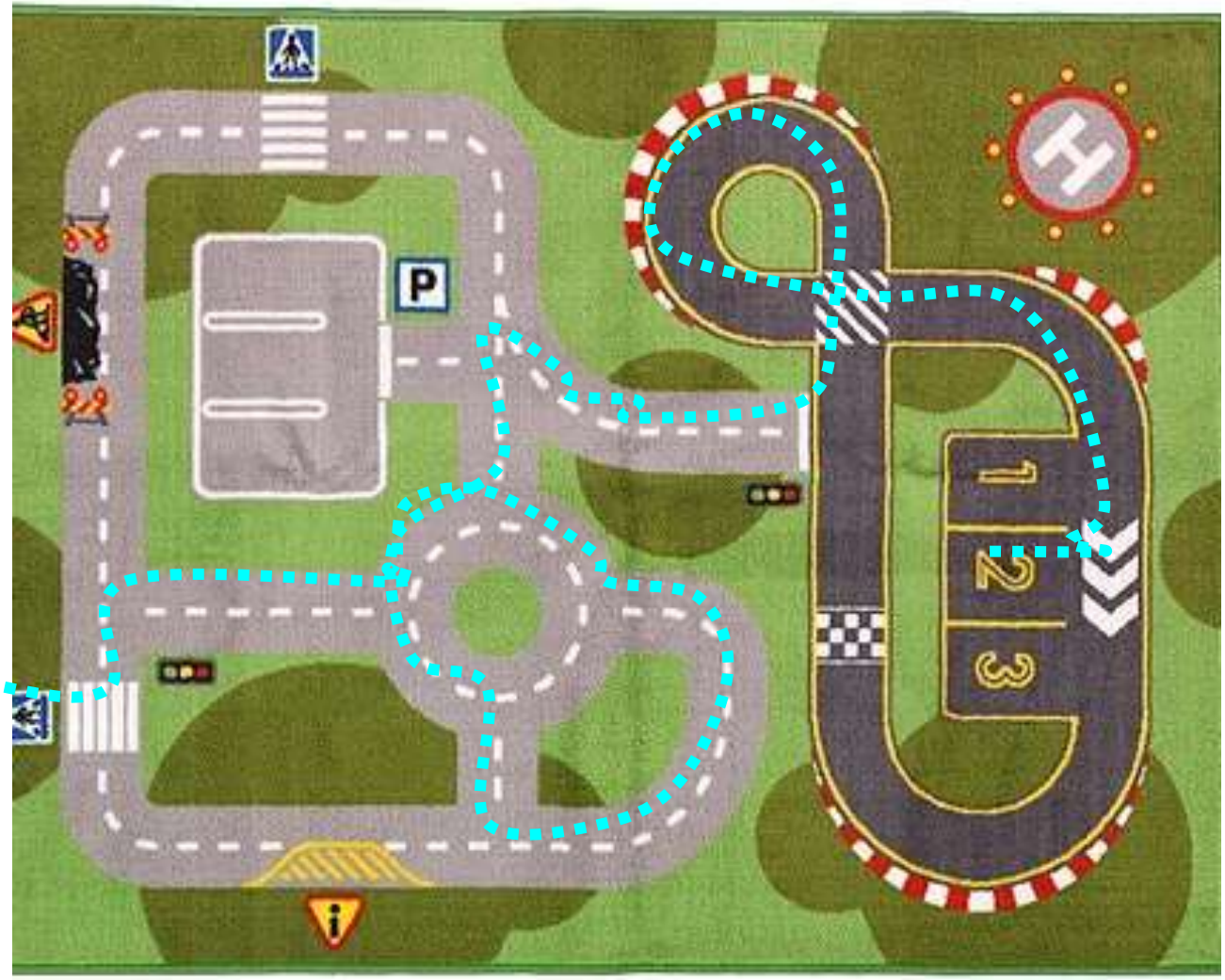
TASK

We need to know the

1. distance your vehicle will travel,
2. the displacement of the vehicle from the start,
3. the average speed over the whole journey,
4. the instantaneous speed of the vehicle as it goes round the roundabout (or alternative).



FOUR TEAMS OF 5 max
(reduce no. of team but ≥ 4 in a team)
Issue work cards for the students to go through

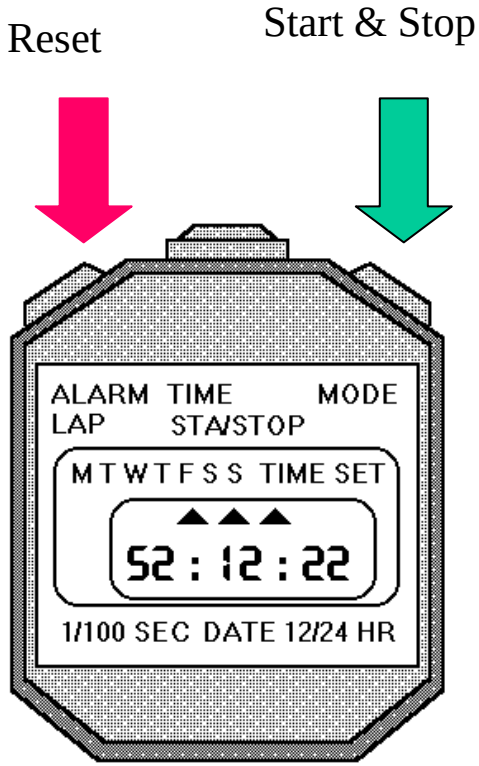
EQUIPMENT

- ✓ 7m of string
- ✓ scissors
- ✓ calculator
- ✓ road play mat
- ✓ radio controlled car
- ✓ results sheet
- ✓ ruler
- ✓ metre stick
- ✓ pens and pencils
- ✓ piece of chalk

YOUR TASK.

Working in teams you need to:

1. measure the DISTANCE that the car will travel following the pre-defined course.
2. record this value on your worksheet
3. measure the DISPLACEMENT of the car from the start to the finish.
4. record this value on your worksheet
5. time how long each person in the group takes to complete the course.
6. record this value on your worksheet
7. time how long note down
8. record as tally marks on your worksheet every time each person in the group leaves the track
9. Find the average speed of the car for each person
10. Find the average velocity of the car for each person.
11. Using the ALBA package record the instantaneous speed of the vehicle at the specific place in the track (see the additional worksheet)



Reading the stopclock

The stopclock display can be a bit confusing. A number that looks like this:

0:0234 means 2.34 seconds.

(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
Name of Contestant	Distance travelled by car (m)	Displacement (m)	Time taken for run (s)	No. of times car went off the track	Average Speed (m/s)	Average Velocity (m/s)	On a scale of 1-5 how good was the driver?