Working Weeks	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17
Start of the week	22-Nov	29-Nov	6-Dec	13-Dec	20-Dec	27-Dec	3-Jan	10-Jan	17-Jan	24-Jan	31-Jan	7-Feb	14-Feb	21-Feb	28-Feb	7-Mar	14-Mar
Sensing and input package	Documentation on the given guides and projects. Chose main languages Rust, Python and technologies: Jetson Nano with Intel Realisense Create/adapt project plan Members tasks asignation	Vehicle Calibration DC motor and Servo motor bnosis and tests Initial Test Track Setup	Implement Streaming and Persistence of Sensor Data	Camera handling	Camera Callibration		Define use-case and test given servers information (localisation on map, cars interaction, gps interaction)		Define other necessary sensors, define use-case, integration (IMU, distance), preprocessing, noise cancelling.								
							Implement Aditional Servo Motor for Camera Rotation										
Perception and scene understanding package			Research, Design and Test Lane Detection Solution	Define information being sent to the brain for the decision making		Lane detection and intersection detection (basic road detection)			Environmental detection								
				Preprocessing, noise cancelling, ROIs definition					Traffic signs detection & classification				Traffic lights detection & classification				
				Research, Design and Test Traffic Sign Detection Solution	Implement and Test Traffic Sign Detection Solution				Environmental server interaction								
									Define objects properties file								
Behaviour and decision making package			Research and Define Planning Architecture (Global / Behaviour / Local Planning)	Establish rudimentary lane Tracking algorithm					Define path planning and validation					Define robustness and safety measures			
						Dynamic Lane following			Define decision making --> priorities of actions and state flow								
								Intersection navigation									
Vehicle control and motion plan packages			Define Control System Architecture	Speed Low Level Control				PID Tuning						Simple action taking maneuvers (parking, stop for traffic sign, stop for traffic light, stop for pedestrian)			
				Lateral Low Level Control													
Final result & Demo	Team can control the physical car remotely	Vehicle has full software package installed and configured for data gathering and control	Robot can keep a lane, can make a curve in simulation. Perception, Sensor Fusion and Decision making all run in real time using multiprocessing.				Robot can keep a lane, can make a curve on testing track			Robot can navigate in intersection				Robot can go on a pre-determined path, stop at stop sign, park at parking sign, slow at crosswalk			
							Team defines and creates it's own physical testing environment										
									Team defines a way of parallel developing and testing								
Deadlines				16-Dec					20-Jan				17-Feb				17-Mar
Checkpoint				1st report	Christmas break				2nd report				3rd report				Mid-term quality gate