```
{nav2_core::Controller
||}
```

```
{cl_nav2z::backward
_local_planner::BackwardLocal
               Planner
|- nh_
- name_
- backwardsPlanPath_
- costmapRos_
- tf_
- goalMarkerPublisher_
- planPub_
- k_rho_
- k_alpha_
- k_betta_
- pure_spinning_allowed
_betta_error_
- linear_mode_rho_error
_threshold_
- alpha_offset_
- betta_offset_
- max_linear_x_speed_
- max_angular_z_speed_
- yaw_goal_tolerance_
- xy_goal_tolerance_
- carrot_distance_
- carrot_angular_distance_
- divergenceDetectionLastCarrot
LinearDistance_
- transform_tolerance_
- waitingTimeout_
- waitingStamp_
- goalReached_
- initialPureSpinningStage_
- straightBackwardsAndPure
SpinningMode_
- enable_obstacle_checking_
- inGoalPureSpinningState_
- waiting_
- currentCarrotPoseIndex_
|+ BackwardLocalPlanner()
+ ~BackwardLocalPlanner()
+ configure()
+ activate()
+ deactivate()
+ cleanup()
+ setPlan()
+ computeVelocityCommands()
+ isGoalReached()
+ setSpeedLimit()
- updateParameters()
- findInitialCarrotGoal()
- updateCarrotGoal()
- resamplePrecisePlan()
- straightBackwardsAndPure
SpinCmd()
- clearMarkers()
- publishGoalMarker()
- computeCurrentEuclideanAnd
AngularErrorsToCarrotGoal()
- checkGoalReached()
- checkCurrentPoseInGoalRange()
- resetDivergenceDetection()
- divergenceDetectionUpdate()
- checkCarrotHalfPlainConstraint()
- generateTrajectory()
- computeNewPositions()
               }
```