Camera class

properties

AOV = 30 % angle of view

Range = 30 % detection range

Count

Xcam = 0 % default position of camera

Ycam = 0 % default position of camera

Theta = 0 % default position of camera

Orient % triangle that show camera view

function obj = Camera(fre)

start

obj.Orient = line([obj.Xcam obj.Xcam+obj.Range\*cosd(obj.Theta)+obj.Range\*tand(obj.AOV/2)\*cosd(90-obj.Theta) obj.Xcam+obj.Range\*cosd(obj.Theta)-obj.Range\*tand(obj.AOV/2)\*cosd(90-obj.Theta) obj.Xcam], [obj.Ycam obj.Ycam+obj.Range\*sind(obj.Theta)-obj.Range\*tand(obj.AOV/2)\*sind(90-obj.Theta) obj.Ycam+obj.Range\*sind(obj.Theta)+obj.Range\*tand(obj.AOV/2)\*sind(90-obj.Theta) obj.Ycam], [1.1 1.1 1.1 1.1],'color', 'green', 'linewidth', 2);

obj.Count = fre;

stop