



GOVERNMENT POLYTECHNIC, VADNAGAR

MECHANICAL ENGINEERING DEPARTMENT

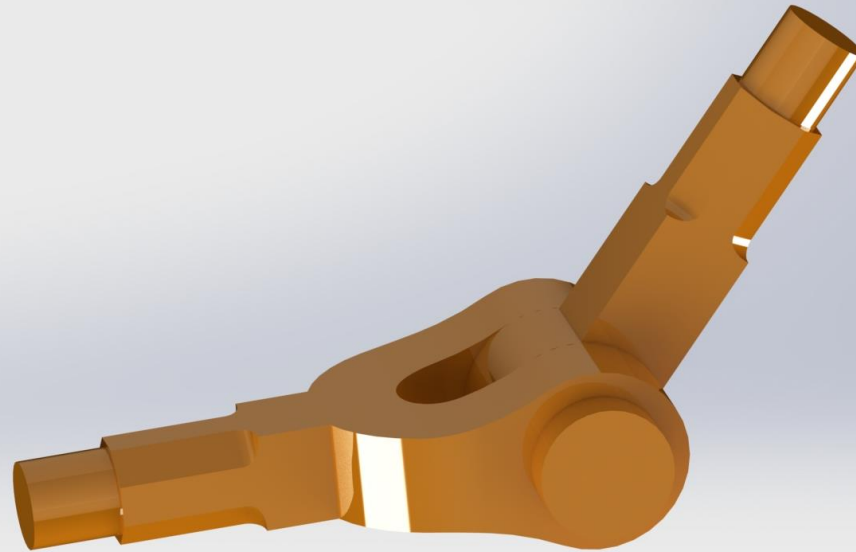
MINI PROJECT

KNUCKLE JOINT ASSEMBLY

PREPARED BY:

1. PATEL DHRUV MAHESHBHAI (206280319004)

KNUCKLE JOINT ASSEMBLY

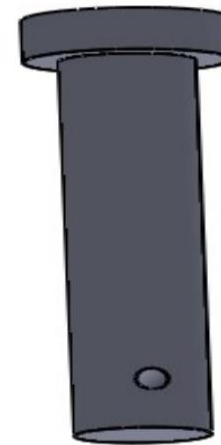


LIST OF PARTS

Sr.No.	Name of part
1	Pin
2	Taper pin
3	Collar
4	Eye end
5	Fork end

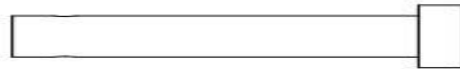
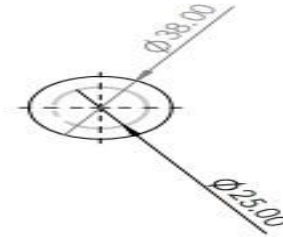
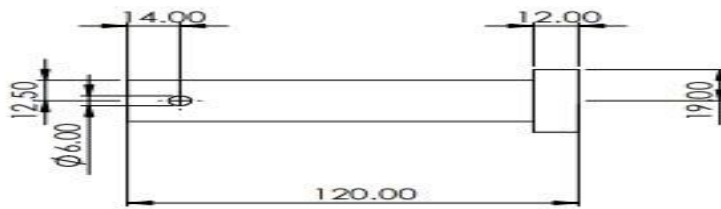
3D MODEL OF KNUCKLE JOINT

- PART-1: PIN



DETAILED MANUFACTURING DRAWING

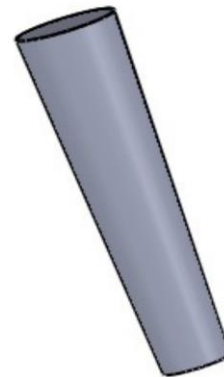
PART-1:PIN



Dept. MECH.	Technical Ref. Pin	Created by DHRUV PATEL	Date:-	Approved by
		Document type ASSEMBLY DRAWING	Document status COMPLETE	
		Title Knuckle Joint	DWG NO:- 1	
		Rev.	Date of issue	Sheet 1/1

3D MODEL OF KNUCKLE JOINT

- **PART-2: Taper pin**



DETAILED MANUFACTURING DRAWING

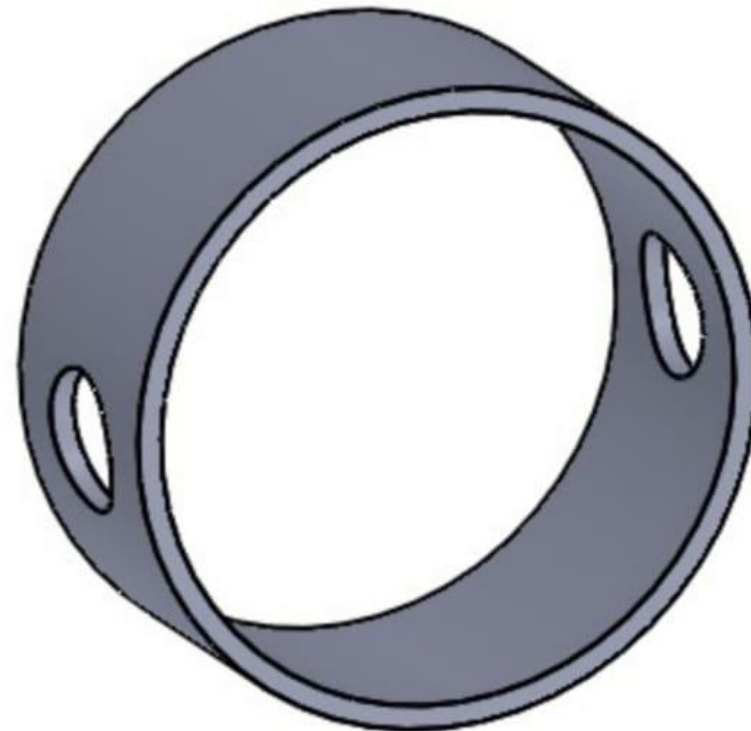
PART-2:TAPER PIN



Dept. MECH.	Technical Ref. Taper Pin	Created by DHRUV PATEL	Date:-	Approved by
		Document type ASSEMBLY DRAWING	Document status COMPLETE	
		Title Knuckle Joint	DWG NO:- 2	
		Rev.	Date of issue	Sheet 1/1

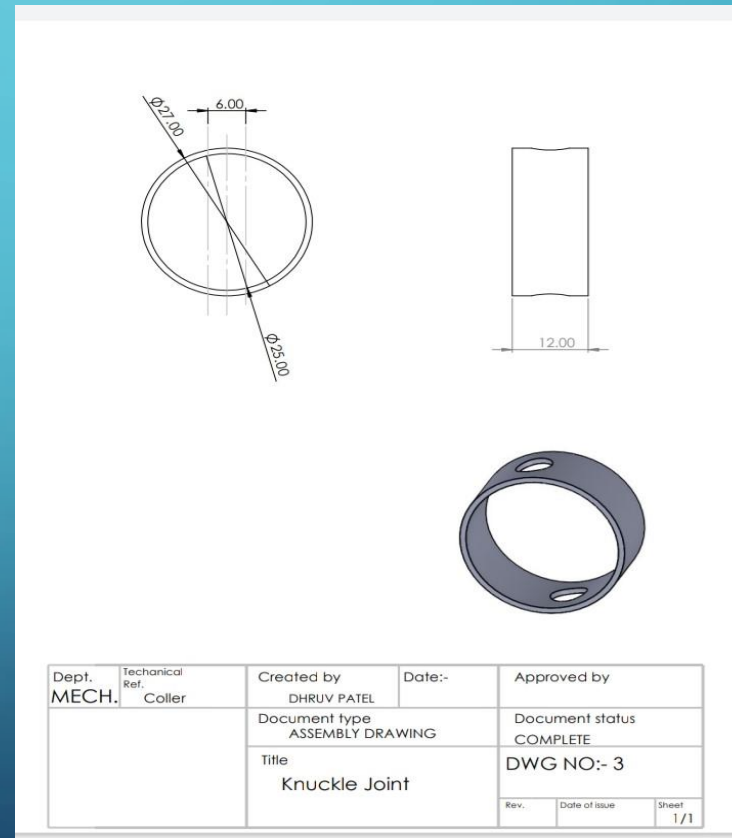
3D MODEL OF KNUCKLE JOINT

- PART-3: COLLER



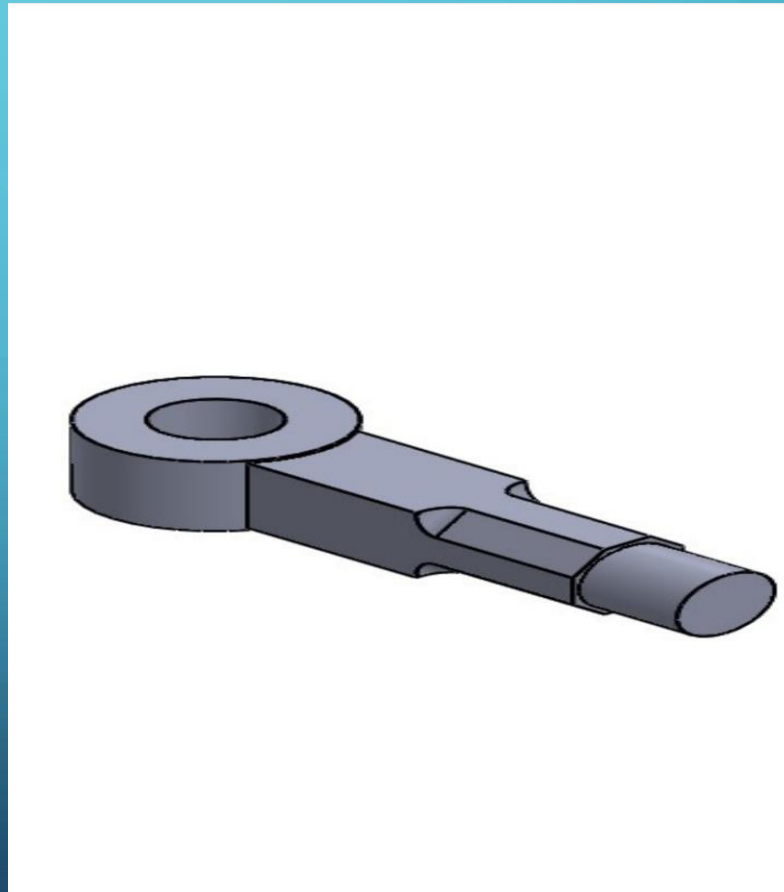
DETAILED MANUFACTURING DRAWING

PART-3:COLLER



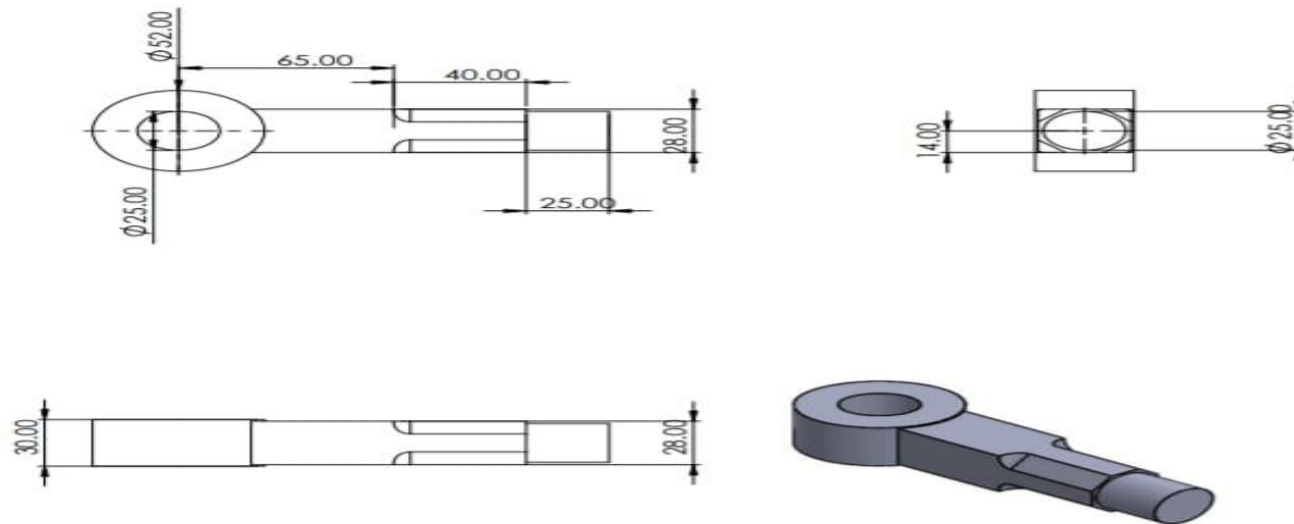
3D MODEL OF KNUCKLE JOINT

- PART-4:EYE END



DETAILED MANUFACTURING DRAWING

PART-4:EYE END



Dept. MECH.	Technical Ref. Eye END	Created by DHRUV PATEL	Date:-	Approved by
		Document type ASSEMBLY DRAWING	Document status COMPLETE	
		Title Knuckle Joint	DWG NO:- 4	
		Rev.	Date of issue	Sheet 1/1

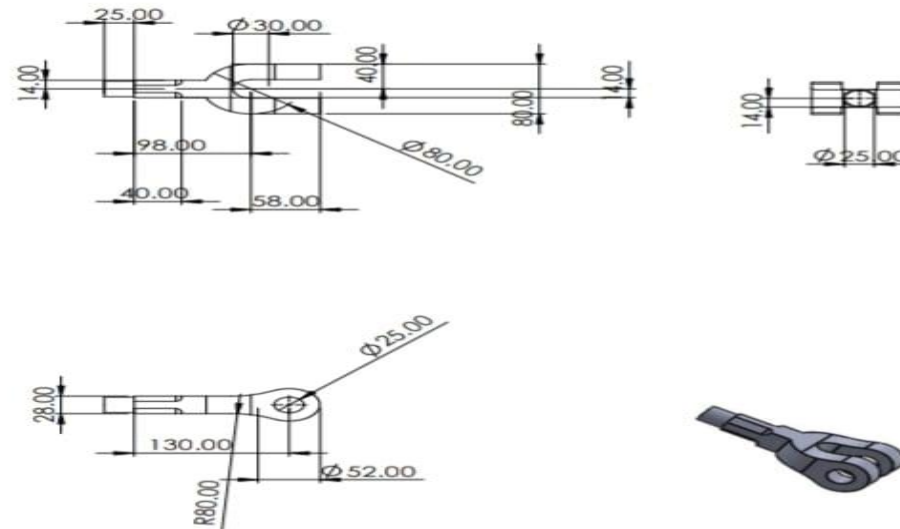
3D MODEL OF KNUCKLE JOINT

- PART-5:FORK END



DETAILED MANUFACTURING DRAWING

PART-5:FORK END

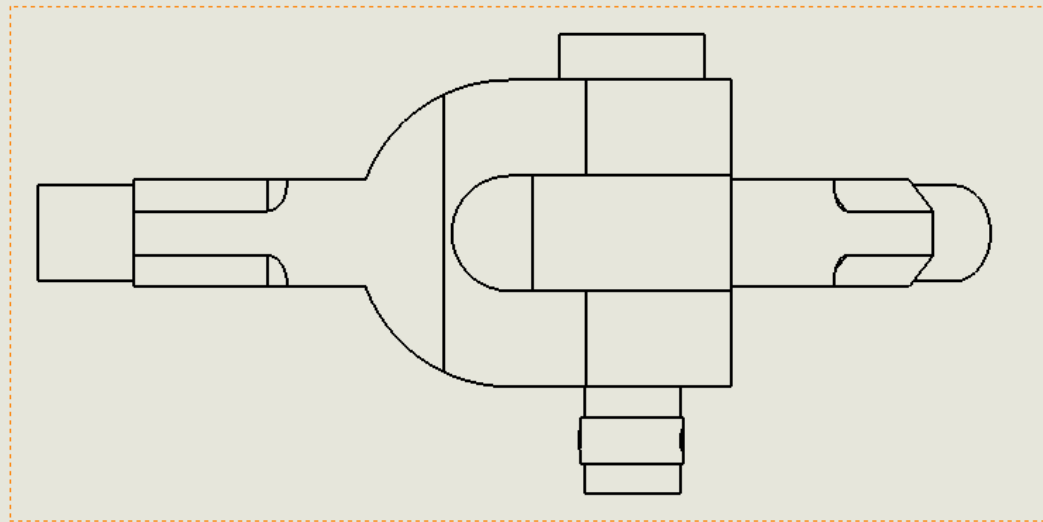


Dept. MECH.	Technical Ref. Fork End	Created by DHRUV PATEL	Date:-	Approved by
		Document type ASSEMBLY DRAWING	Document status COMPLETE	
		Title Knuckle Joint	DWG NO:- 5	
		Rev.	Date of Issue	Sheet 1/1

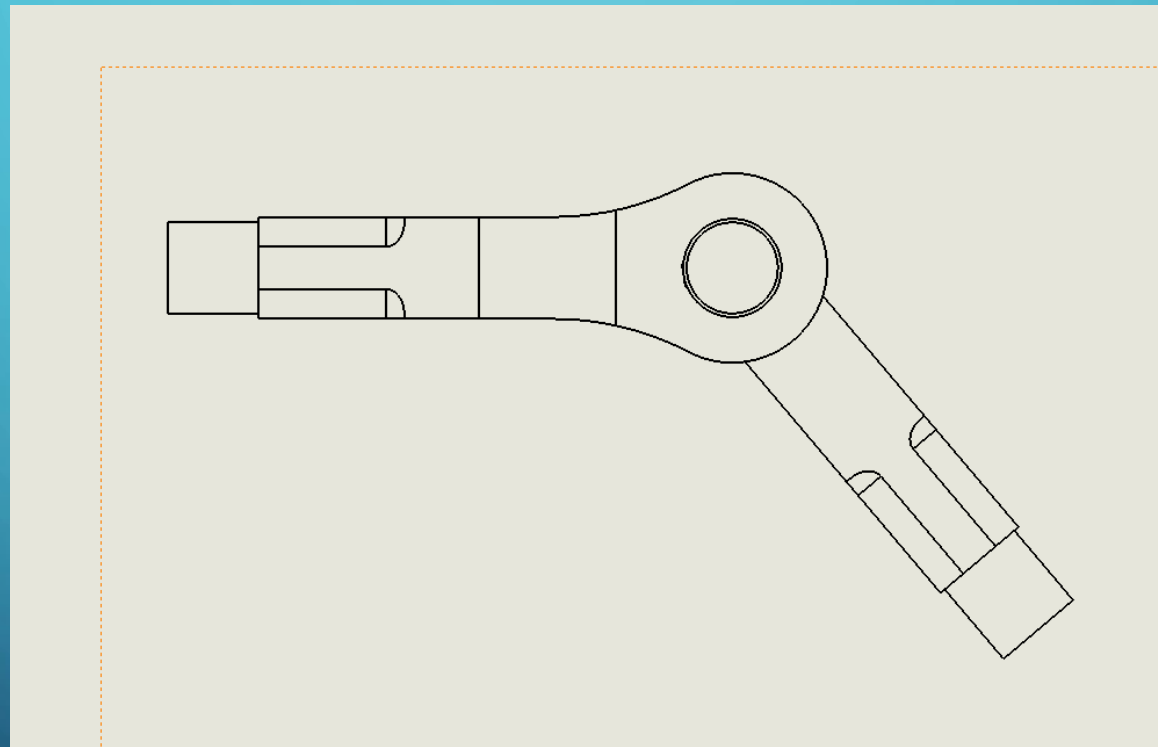
BILL OF MATERIAL

Part No.	Description	Material	Quantity
1	Pin	Structural Steel	1
2	Taper pin	Structural Steel	1
3	Collar	Structural Steel	1
4	Eye end	Structural Steel	1
5	Fork end	Structural Steel	1

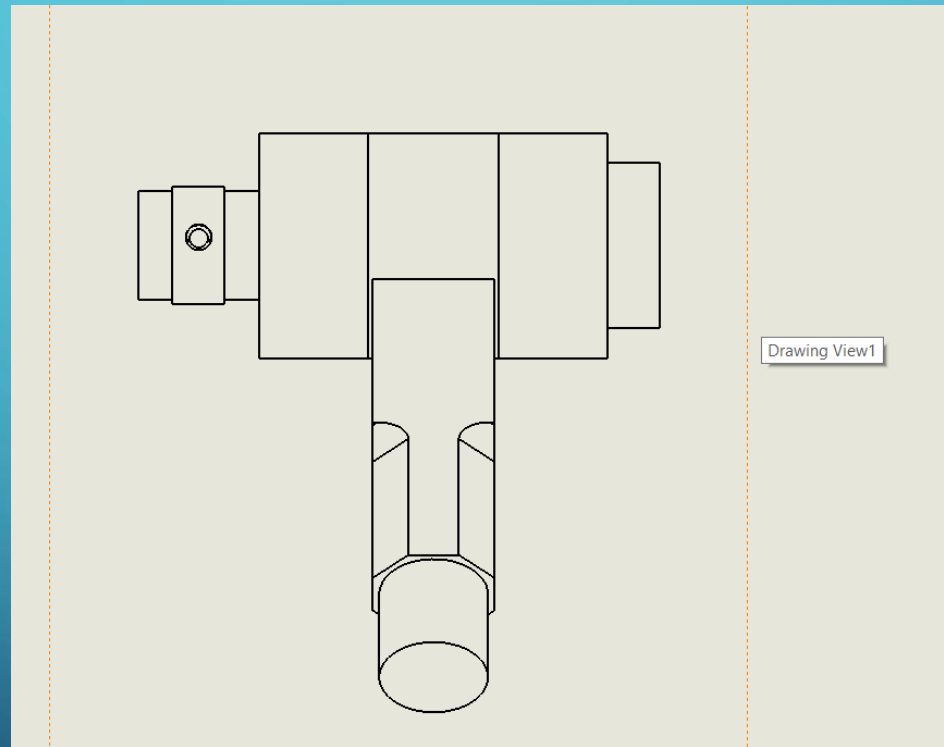
FINAL ASSEMBLY DRAWING TOP VIEW



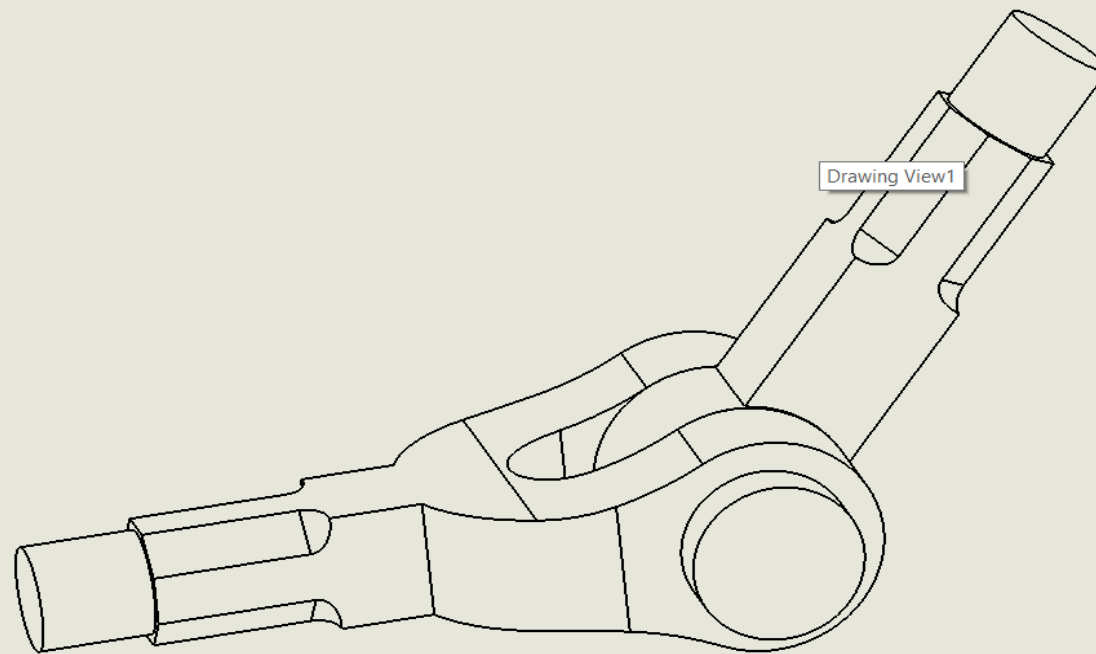
FINAL ASSEMBLY DRAWING FRONT VIEW



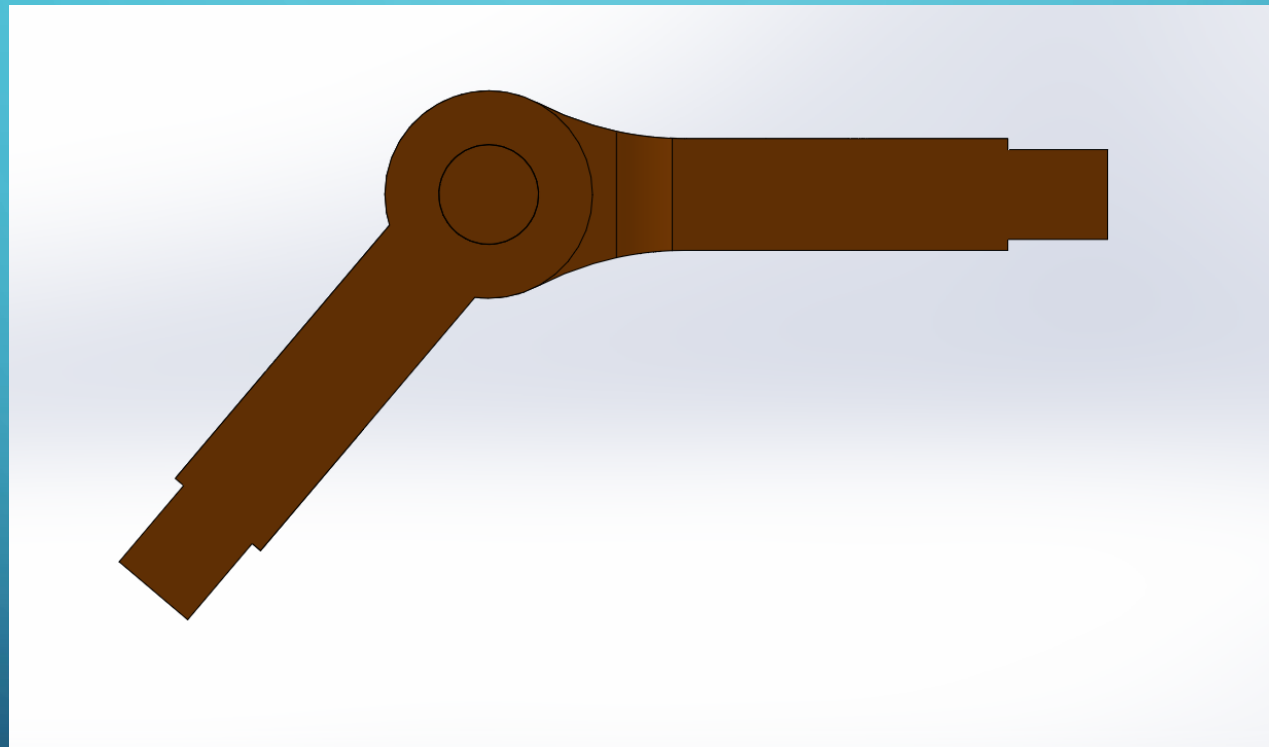
FINAL ASSEMBLY DRAWING RIGHTSIDE VIEW



FINAL ASSEMBLY DRAWING ISOMETRIC VIEW



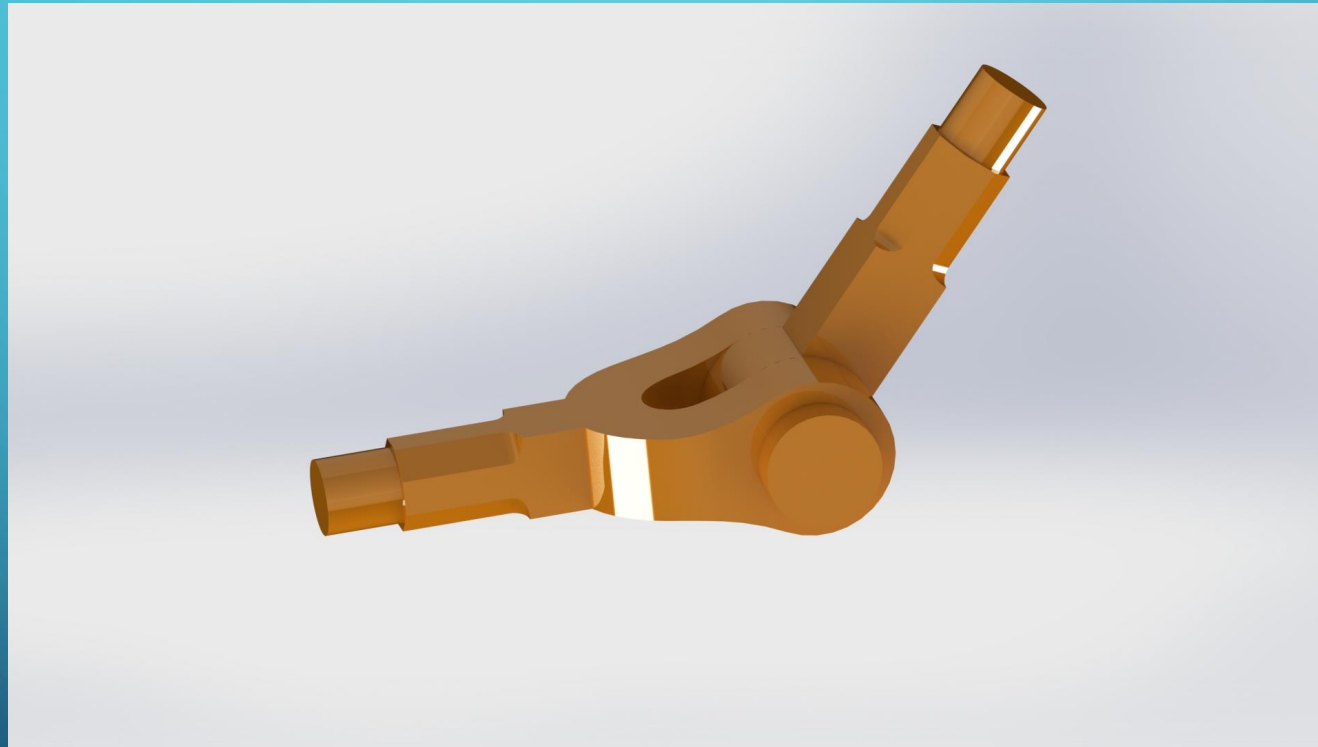
FINAL ASSEMBLY DRAWING SECTIONAL VIEW



FINAL ASSEMBLY DRAWING SECTIONAL VIEW



KNUCKLE JOINT ASSEMBLY



The background is a blue gradient. In the corners, there are white line art designs resembling circuit boards or neural networks, with lines and small circles connecting them.

THANK YOU