PROJECT TITLE : REGENERATIVE BREAKING SYSTEM

GROUP NO.: – 58

GROUP MEMBER'S NAME :

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9. DUSHYANT

GUIDE NAME:

TUTOR:

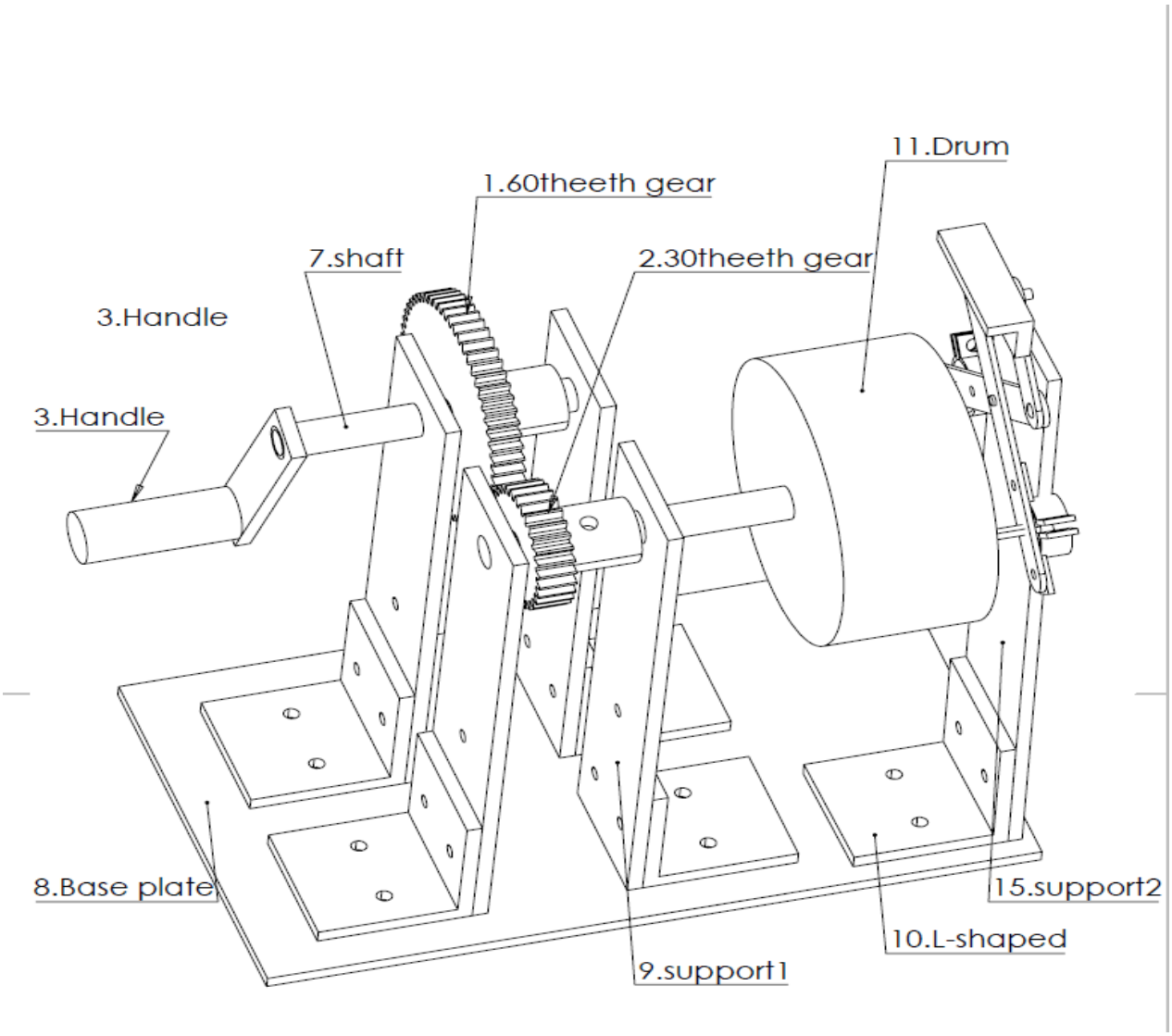
Section : **Gr. No. : 58**

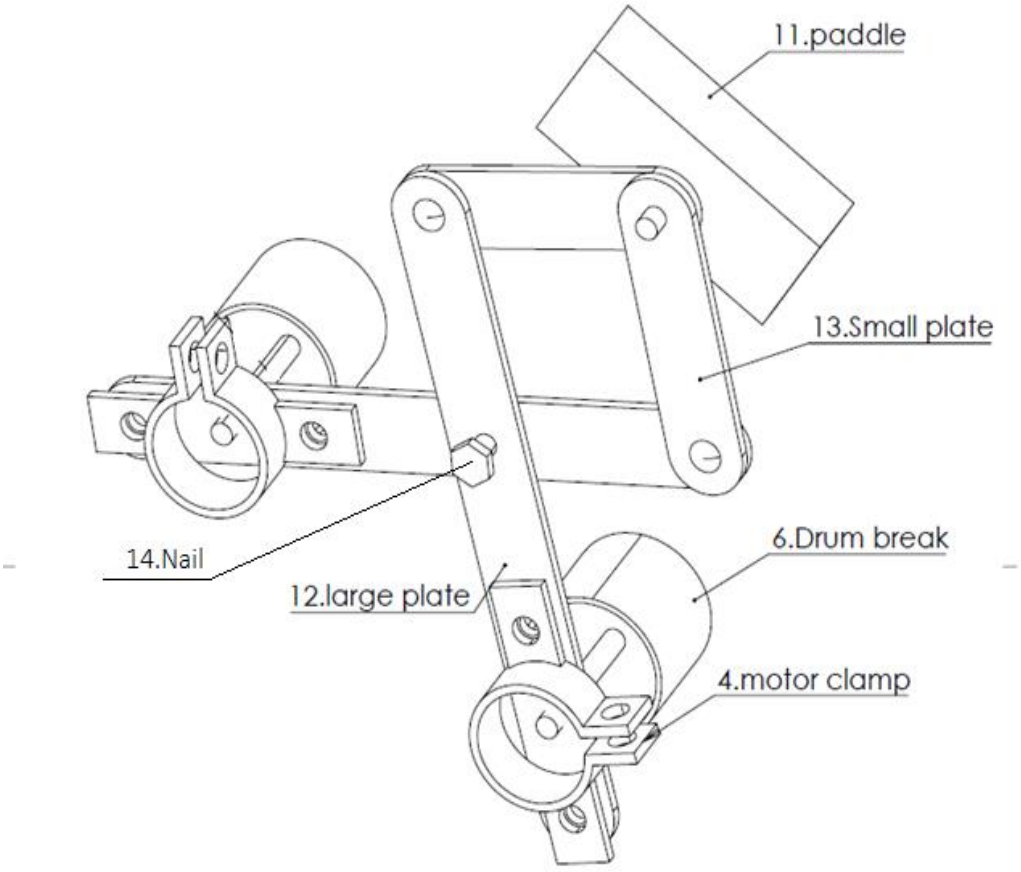
INDEX

(All dimensions are in mm)

PART NO.	PART NAME	DIMENSIONS	PAGE NUMBER	QUANTITY	MATERIAL
	Isometric View		1 to 2		Mild steel
1	60 Teeth spur gear	Ø93X35	3	1	Mild steel
2	30 Teeth spur gear	Ø48X37	4	1	Mild steel
3	Handle	50X10; ø20; ø5	5	1	Plastic
4	Motor clamp	50X10; ø20; ø5	6	2	Plastic
5	Drum	ø110X50	7	1	Mild steel
6	Drum Break	ø24X22; ø4X30	8	2	Mild steel
7	Shaft	Ø12.7X100L	9	2	Mild steel
8	Base Plate	150X260X3L	10	1	Mild steel
9	Support1	200X50X5L; 12.7; ø5	11	4	Mild steel
10	L- Plate	50X50 ; ø5	12	5	Mild steel
11	Paddle	50x22x20	13	1	Mild steel
12	Large Plate	108.06X14X2; ø14	14	2	Mild steel
13	Small Plate	43.22X14X2; ø14	15	2	Mild steel
14	Nail	ø4X10	16	1	Mild steel
15	Support2	250X50X 5	17	1	Mild steel

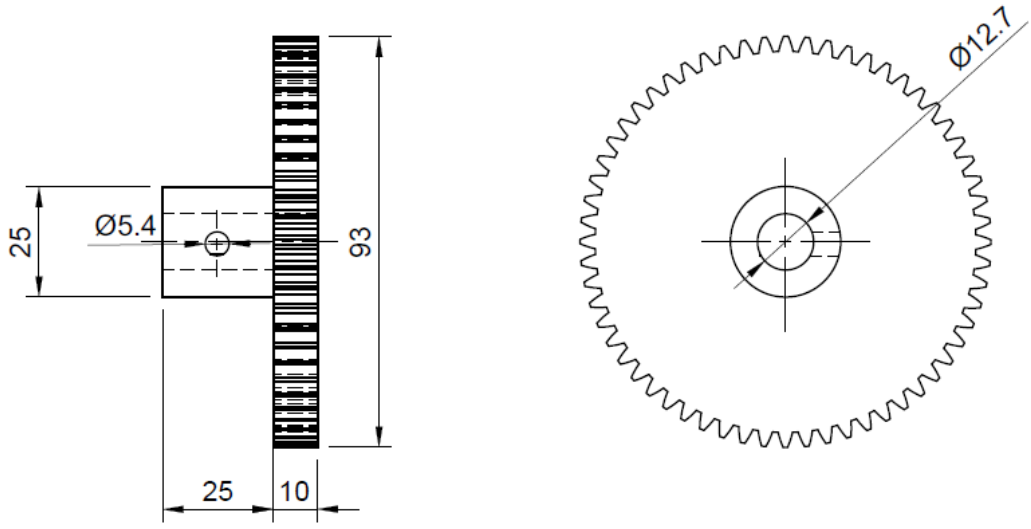
REGENERATIVE BREAKING SYSTEM:





ALL DIMENSIONS ARE IN MM

LARGER GEAR

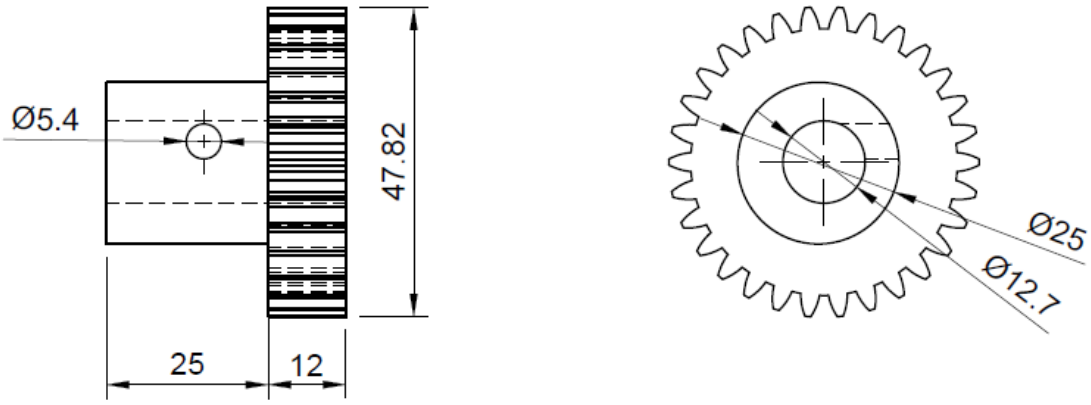


Scale 3:4

Quantity	=	1
Nos. of Teeth (N)	=	60
Module (M)	=	1.5
Outer diameter (OD)	=	M (N +2) = 93mm
Rod diameter (ID)	=	12.7
Depth of cut	=	2.157 X M = 3.24mm
Tap hole size	=	5.2 mm drill & ¼" tapping
Indexing calculation	=	40 / N =2/3

ALL DIMENSIONS ARE IN MM

SMALLER GEAR



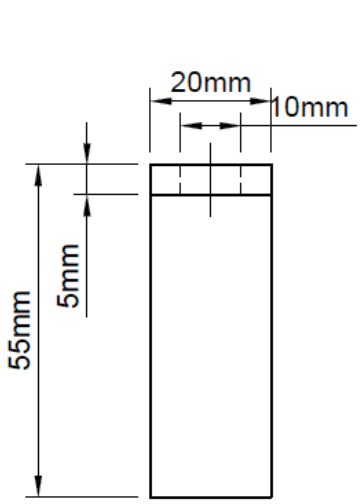
Scale 2:1

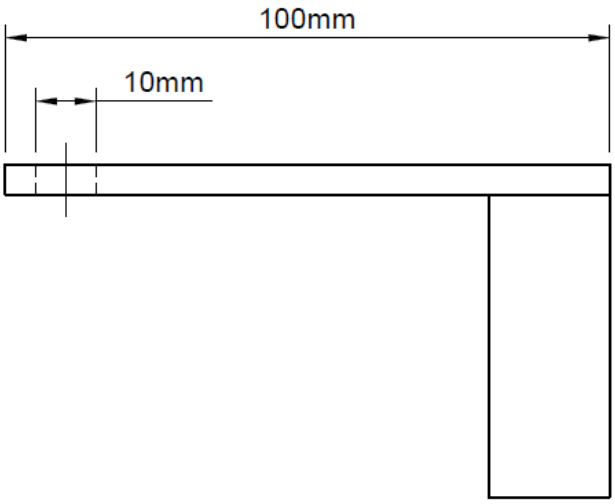
Quantity	=	1
Nos. of Teeth (N)	=	30
Module (M)	=	1.5
Outer diameter (OD)	=	M (N +2) = 48
Rod diameter (ID)	=	12.7
Depth of cut	=	2.157 X M = 3.24
Tap hole size	=	5.2 mm drill & ¼" tapping
Indexing calculation	=	40 / N = 4/3

ALL DIMENSIONS ARE IN MM

PART NO. 3 PAGE NO.5

HANDLE



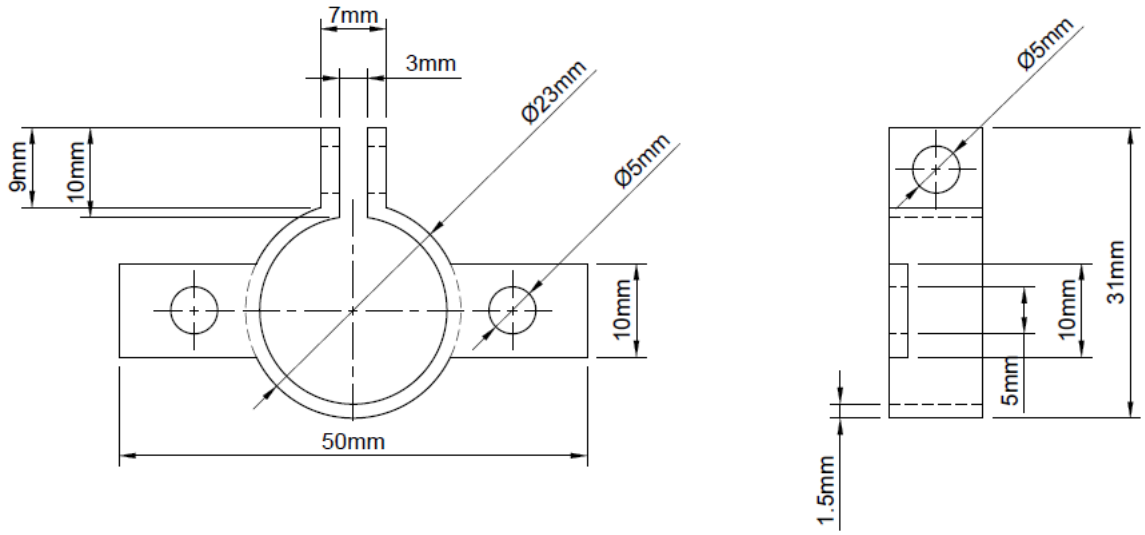


SCALE 1:1

ALL DIMENSIONS ARE IN MM

REQUIRED MATERIAL= Plastic
DIMENSIONS (mm):
FLAT SIZE: 50X10
CIRCULAR PART: ø20
HOLE CUT : ø5

CLAMP

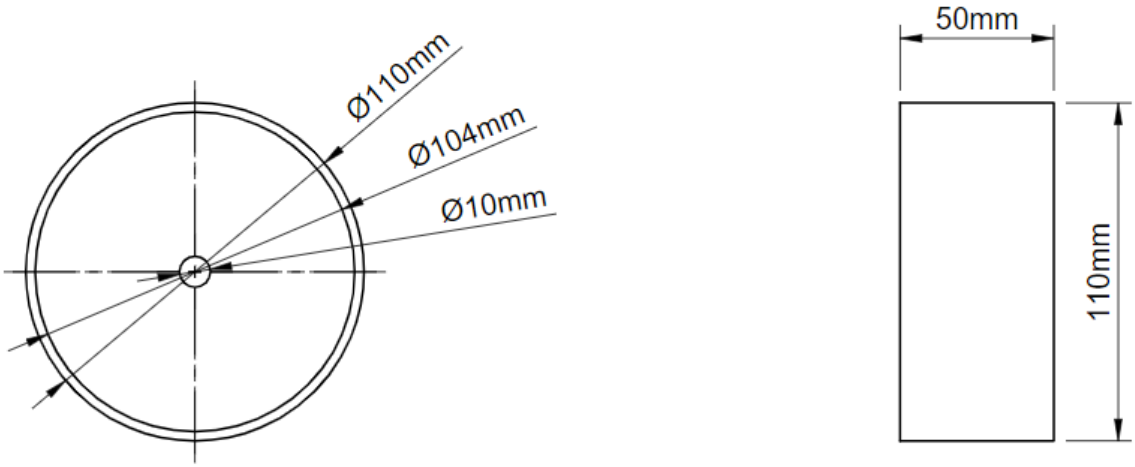


SCALE 2:1

ALL DIMENSIONS ARE IN MM

REQUIRED MATERIAL= Plastic
DIMENSIONS (mm):
FLAT SIZE: 50X10
CIRCULAR PART: ø20
HOLE CUT : ø5

LARGER DRUM

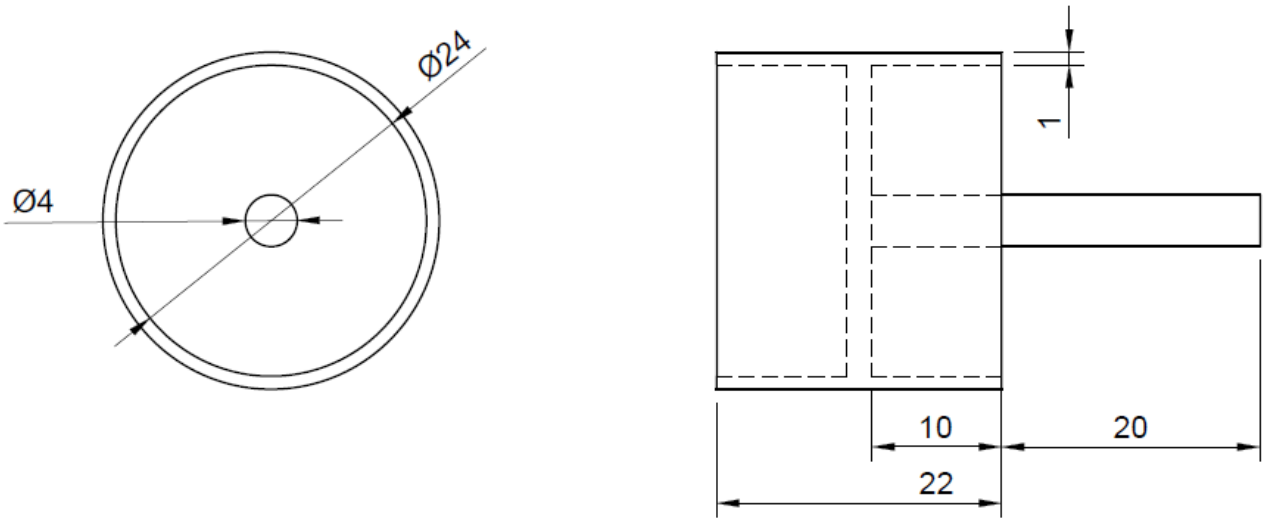


SCALE 1:2

ALL DIMENSIONS ARE IN MM

REQUIRED MATERIAL= Mild Steel
DIMENSIONS (mm):
CIRCULAR PART: ø110X50L
HOLE CUT : ø10

DRUM BREAK

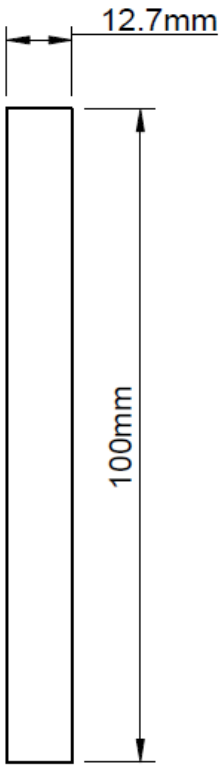


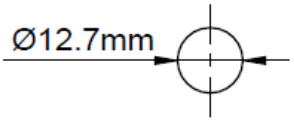
Scale 2:1

ALL DIMENSIONS ARE IN MM

REQUIRED MATERIAL= Plastic DIMENSIONS (mm): CYLINDERICAL PART: ø24X22L ROD: ø4X30L

SHAFT

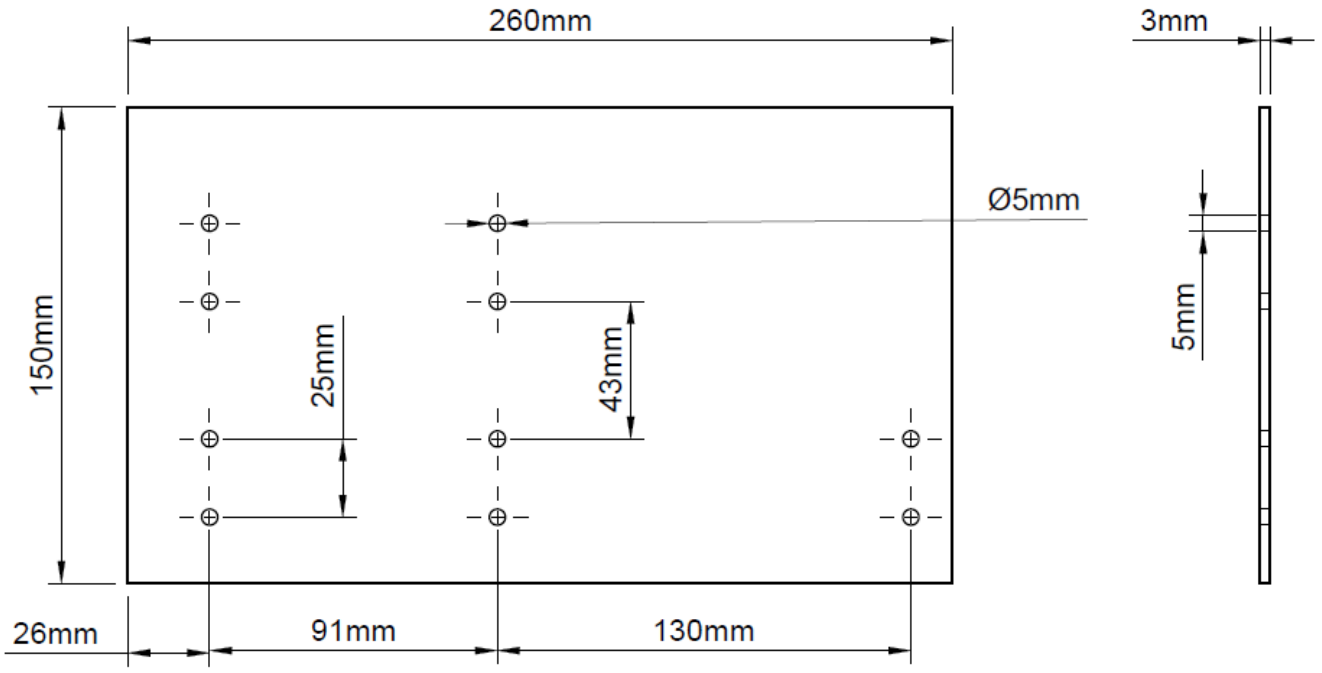




ALL DIMENSIONS ARE IN MM

REQUIRED MATERIAL= Mild Steel
DIMENSIONS (mm): Ø12.7X100L

BASE PLATE

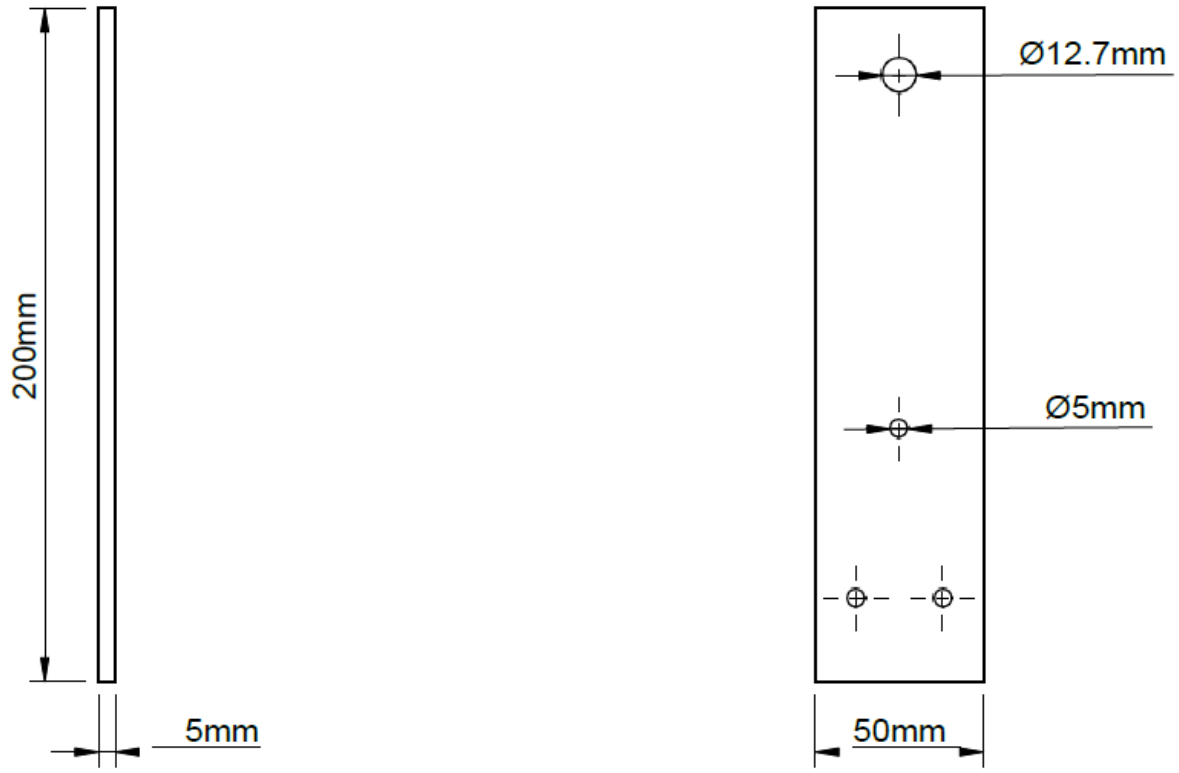


Scale 1:2

ALL DIMENSIONS ARE IN MM

REQUIRED MATERIAL= Mild Steel
DIMENSIONS (mm): 150X260X3L
HOLE CUT: ø5

SUPPORT1

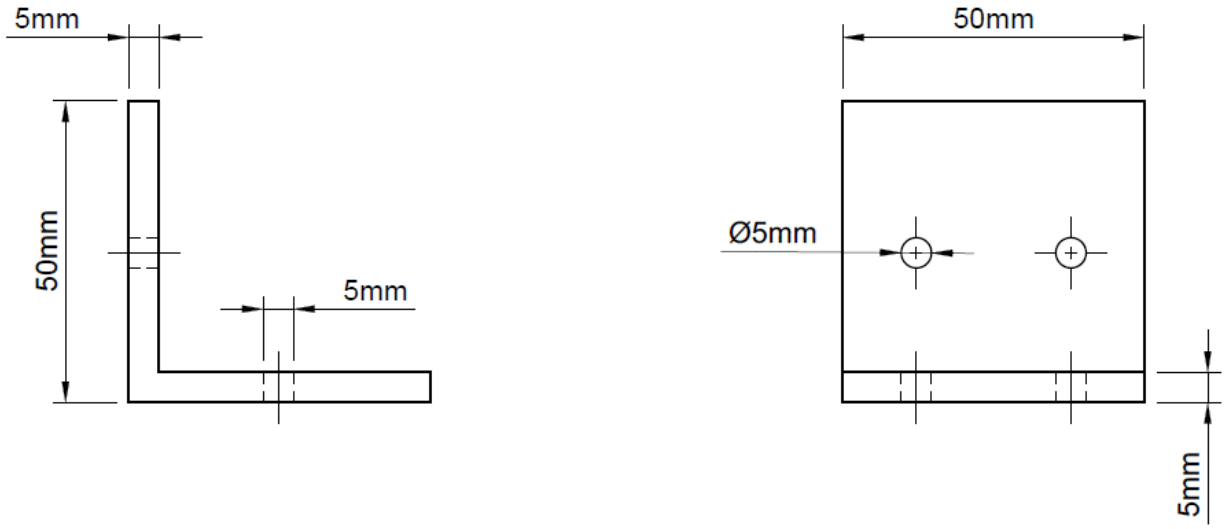


SCALE 1:2

ALL DIMENSIONS ARE IN MM

REQUIRED MATERIAL= Mild Steel DIMENSIONS (mm): 200X50X5L HOLE CUT 1: ø12.7 HOLE CUT 2: ø5

L-PLATE

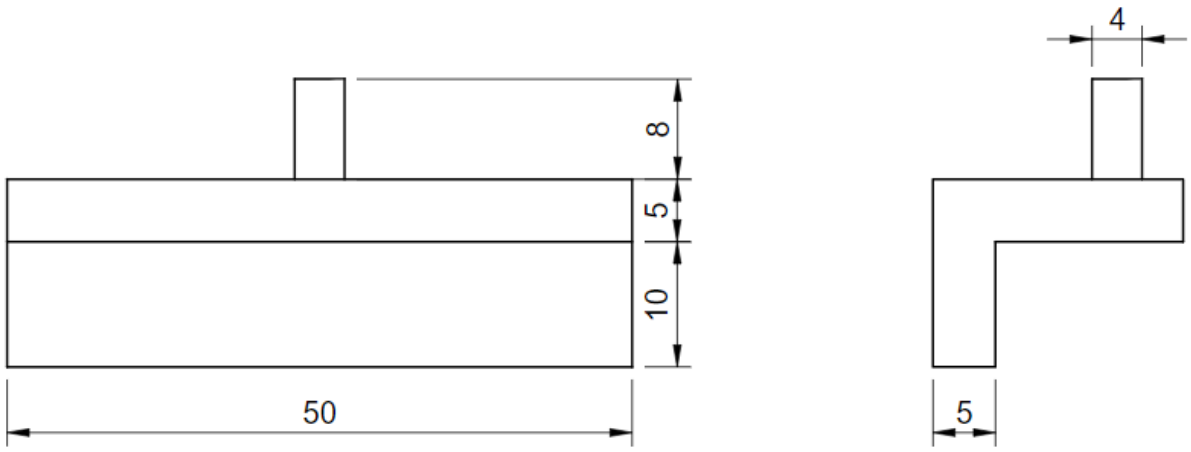


SCALE 1:1

ALL DIMENSIONS ARE IN MM

REQUIRED MATERIAL= Mild Steel
DIMENSIONS (mm): 50X50
HOLE CUT : ø5

PADLE



Scale 2:1

ALL DIMENSIONS ARE IN MM

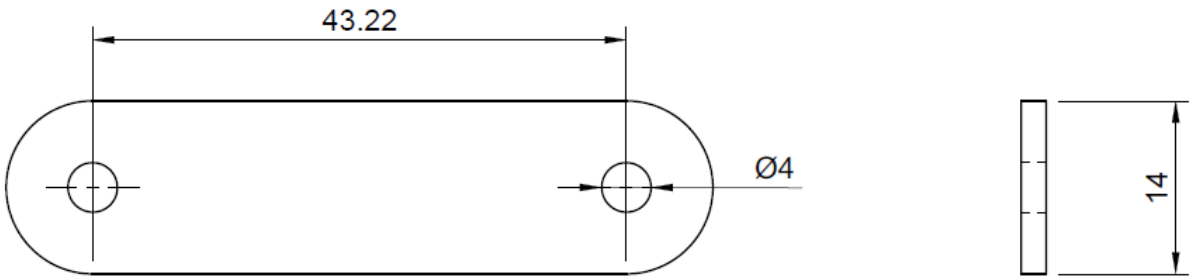
REQUIRED MATERIAL= Mild Steel DIMENSIONS (mm): 50x22x20

LARGE PLATE

ALL DIMENSIONS ARE IN MM

REQUIRED MATERIAL= Mild stell
DIMENSIONS (mm):
FLAT SIZE: 108.06X14X2
CIRCULAR EDGE: ø14
HOLE CUT : ø4

SMALL PLATE

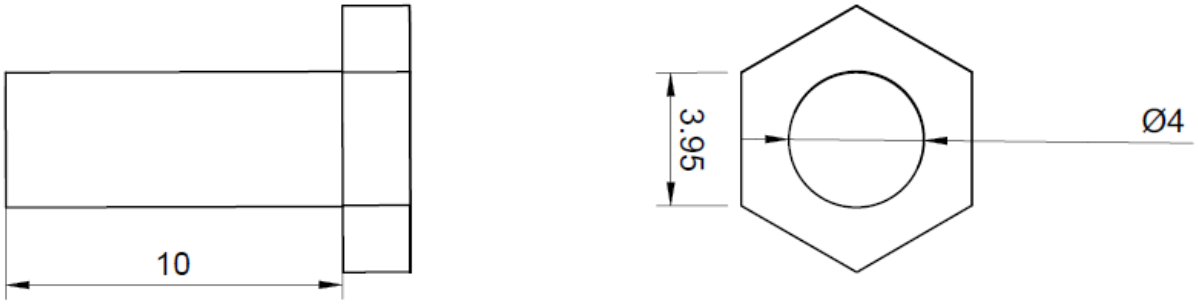


Scale 2 :1

ALL DIMENSIONS ARE IN MM

REQUIRED MATERIAL= Mild Steel
DIMENSIONS (mm):
FLAT SIZE: 43.22X14X2
CIRCULAR EDGE: ø14
HOLE CUT : ø4

NAIL

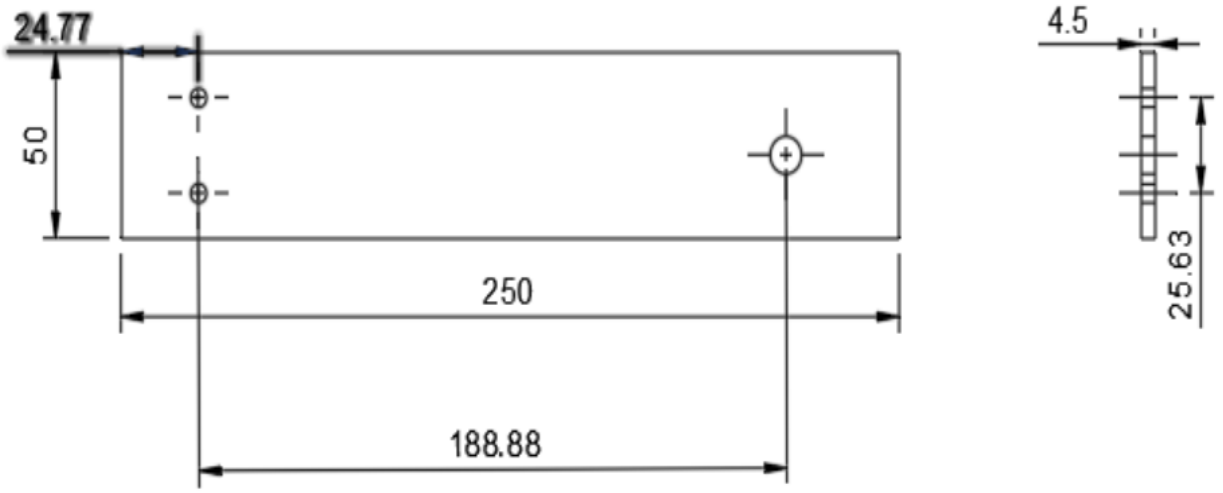


Scale 5:1

ALL DIMENSIONS ARE IN MM

REQUIRED MATERIAL= Mild Steel DIMENSIONS (mm): ø4X10 HEXAGON FACE: 3.95

SUPPORT2



ALL DIMENSIONS ARE IN MM

REQUIRED MATERIAL= Mild Steel
DIMENSIONS (mm): 250X50X5L
HOLE CUT 1: ø
HOLE CUT 2: ø