



education
 Department:
 Education
 Kwazulu - Natal

INSTRUCTIONS

1. The paper consists of **THREE** questions.
2. Answer **ALL** the questions.
3. All drawings must be drawn to scale 1:1, unless otherwise stated.
4. The questions must be answered on the answer sheets provided.
5. All the answer sheets must be re-stapled in numerical sequence and handed in, irrespective of whether the question was attempted or not.
6. Careful time management is essential in order to complete **all** questions.
7. Print your name in the block provided on every answer sheet.
8. All answers must be drawn accurately and neatly.
9. Any details or dimensions not given must be assumed in good proportion.

GRADE 10

ENGINEERING GRAPHICS AND DESIGN
PAPER 1

MARKING
MEMORANDA

MARKS : 100

TIME : 1.5 HOURS

THIS PAPER CONSISTS OF 4 PAGES.

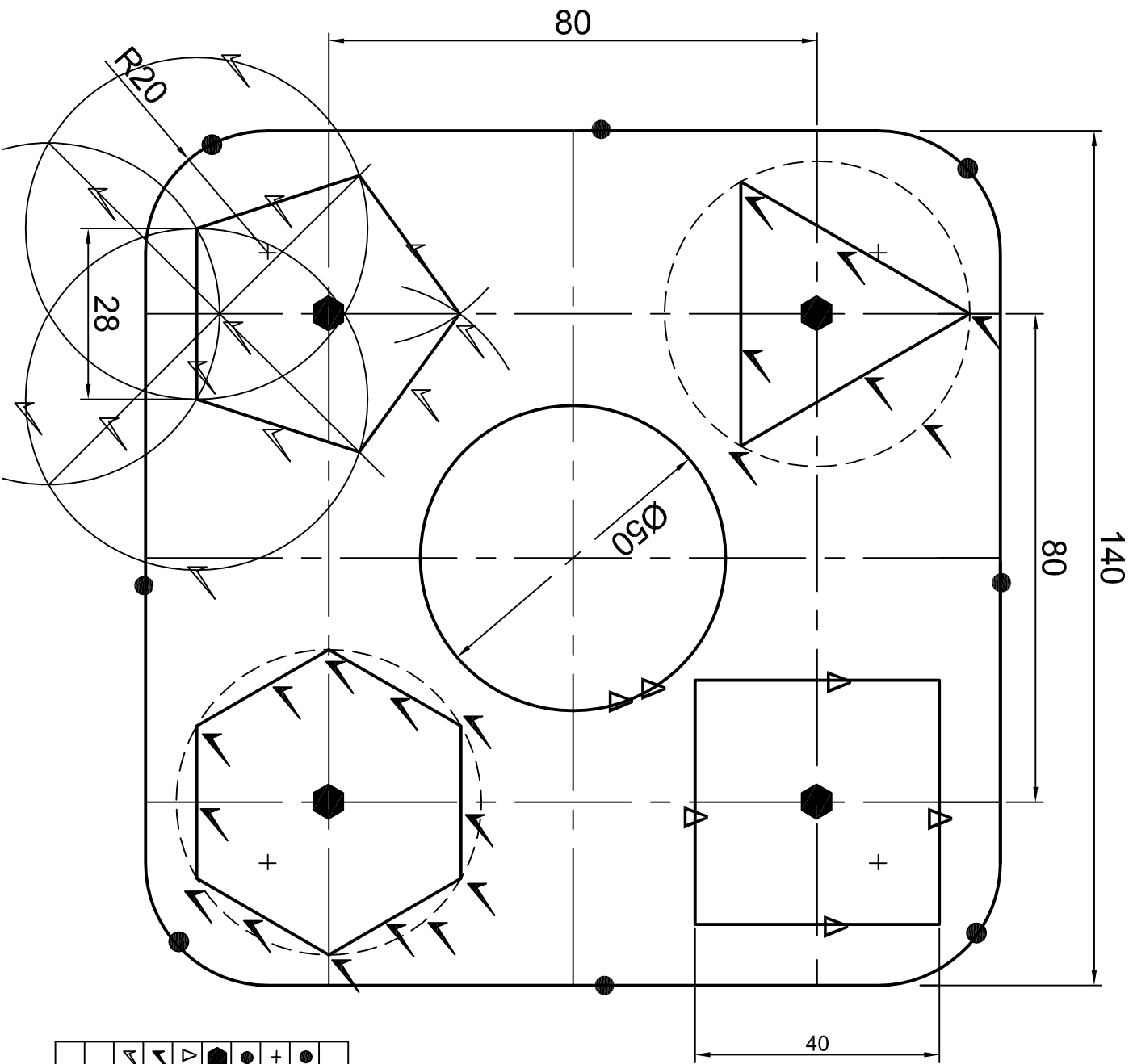
FOR OFFICIAL USE ONLY							
		MODERATED MARK					
1	40						
2	30						
3	30						
TOTAL	100						

LEVEL	CHECKED BY

NAME :	_____
GRADE :	_____

Please turn over

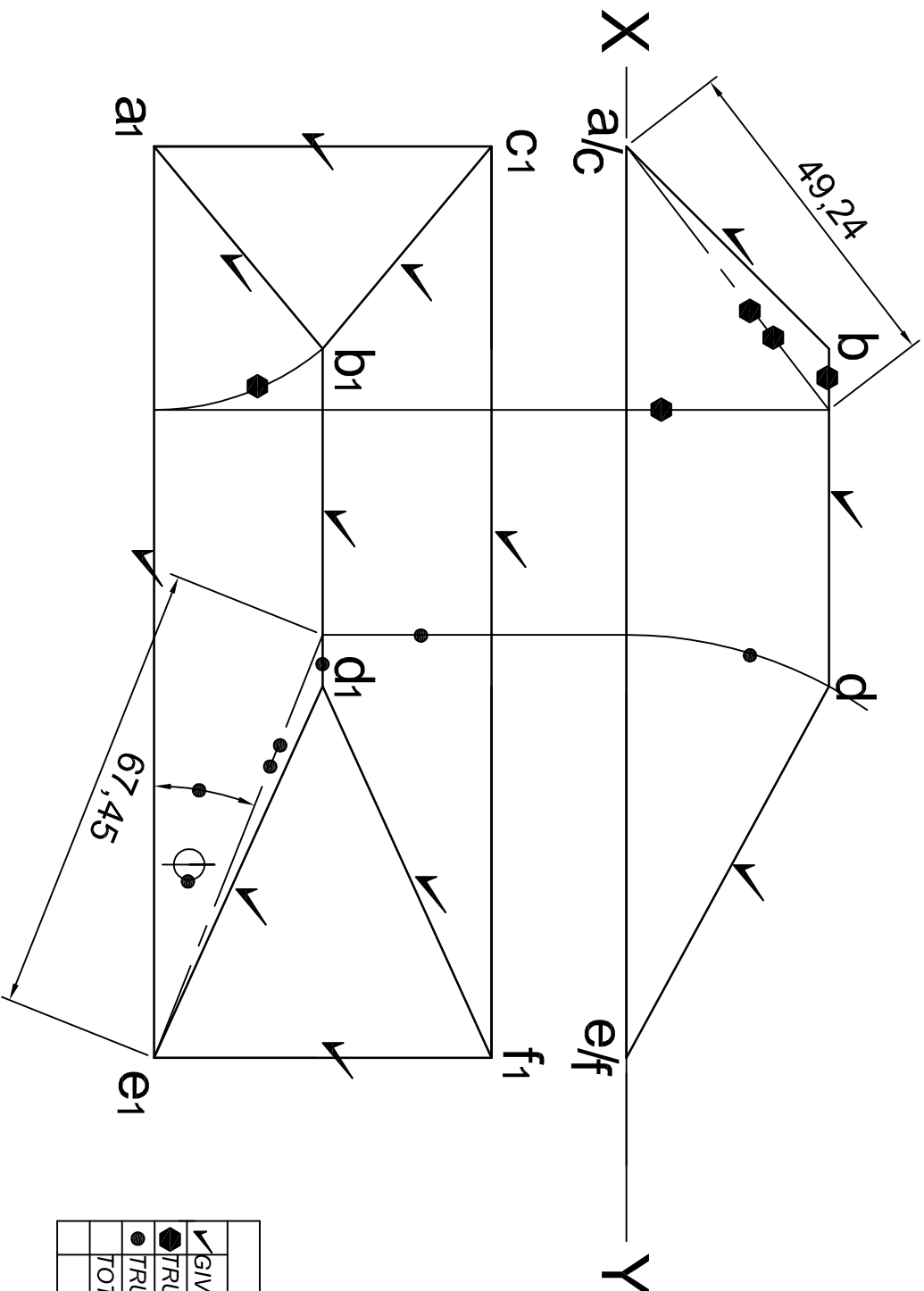
QUESTION 1



ASSESSMENT CRITERIA

● SIDES x4	4/2 = 2	
+ FILLET CENTRES x4	4 x 1 = 4	
● FILLETS x4	4 x 1 = 4	
● POLYGON CENTRES x4	4 x 1 = 4	
Δ CIRCLE + SQUARE	6/2 = 3	
✓ INSCRIBED TRIANGLE + HEXAGON	20/2 = 10	
✓ PENTAGON	12/2 = 6	
DIMENSIONS	7 x 1 = 7	
TOTAL	40	

QUESTION 2

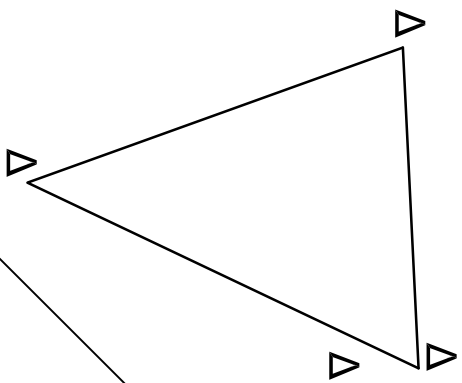


TRUE LENGTH (AB) ●	49.24mm
TRUE INCLINATION (DE) TO VP ●	22°
TOTAL LENGTH (ABDE)	49.24+50 +67.45 +135 = 301.69mm

ASSESSMENT CRITERIA		
✓ GIVEN VIEWS (FRONT + TOP)		12
● TRUE LENGTH (AB)		6
● TRUE INCLINATION (DE) TO VP		8
TOTAL LENGTH (ABDE)		4
TOTAL		30

30

TRUE SIZE



X_1

X_1

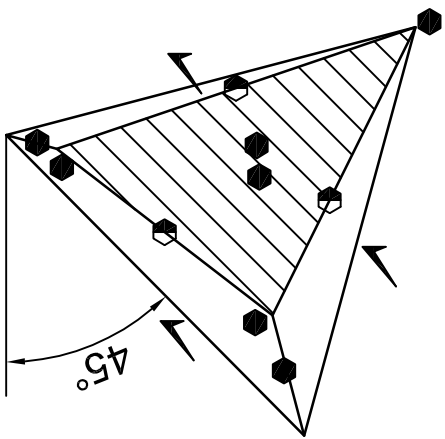
X

S

SV

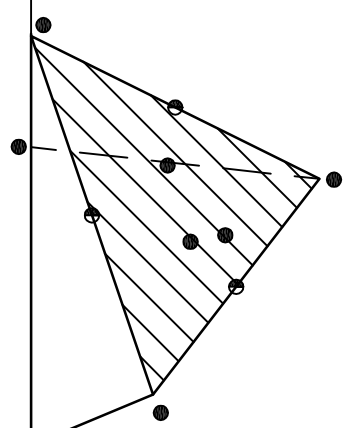
45°

45°



Y

Y



ASSESSMENT CRITERIA		
✓	GIVEN VIEWS (FRONT + TOP)	8
◼	TOP VIEW	8½
●	LEFT VIEW	9½
△	TRUE SHAPE	4
	TOTAL	30

◼ ● represent ½ marks

30

QUESTION 3